
Summary of Ambient Air Monitoring Results – July 2012 to April 2013

American Cyanamid Superfund Site

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CH2MHILL®

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Acronyms and Abbreviations

°F	degrees Fahrenheit
µg/kg	micrograms per kilogram
µg/m ³	micrograms per cubic meter
ASTM	ASTM International (formerly the American Society for Testing and Materials)
HC	hard-crumbly
I-287	Interstate Highway 287
LOS	light oily sludge
mg/kg	milligrams per kilogram
mmHg	millimeters of mercury
OU 8	Operable Unit 8
PAH	polycyclic aromatic hydrocarbon
Pfizer	Pfizer Inc.
PM ₁₀	particulate matter less than 10 microns in aerodynamic diameter
QAPP	Quality Assurance Project Plan
RSL	regional screening level
Site	American Cyanamid Superfund Site in Bridgewater Township, New Jersey
SVOC	semivolatile organic compound
UMATP	Urban Air Toxics Monitoring Program
USEPA	United States Environmental Protection Agency
VOC	volatile organic compound
VR	viscous-rubbery
WHC	Wyeth Holdings Corporation

Introduction

1.1 Project Description

This ambient air monitoring report has been prepared for Pfizer Inc. (Pfizer) on behalf of Wyeth Holdings Corporation (WHC) and documents the results of the first year of ambient air monitoring comprising four quarterly sampling events at the American Cyanamid Superfund Site in Bridgewater Township, New Jersey (Site). Ambient air monitoring has been conducted along the fence line of the Site and in the vicinity of Impoundments 1 and 2, designed to provide background ambient air monitoring locations at upwind locations during each quarterly monitoring event. The overall objective of the air monitoring program is to develop a baseline set of ambient air monitoring data before implementation of remedial activities for both the Site-wide remedy (i.e. Operable Unit 4 or OU4) and Impoundments 1 and 2 Focused Feasibility Study pilot study (i.e. OU8). Sampling during this ambient air monitoring program was conducted using the methods described in the *Ambient Air Monitoring Quality Assurance Project Plan (QAPP)* (CH2M HILL 2012a). The results presented here are from four quarters of ambient air sampling conducted from July 2012 to April 2013.

1.2 Site History

The Calco Chemical Company, which started manufacturing chemical intermediates and dyes in 1915, originally owned the Site. In 1929, American Cyanamid Company purchased the Site and began producing pharmaceuticals and chemicals in the 1930s. In November 1994, the American Cyanamid Company was acquired by the American Home Products Corporation, which changed its name to Wyeth in 2002. In October 2009, Pfizer acquired Wyeth, including its subsidiary Wyeth Holdings Corporation (WHC). The Site is presently owned by WHC, which is now a subsidiary of Pfizer.

1.3 Site Description

The Site is located in the southeastern section of Bridgewater Township, Somerset County, New Jersey. The Site is bounded by the New Jersey Transit railway to the north, the Raritan River to the south and west, and Somerset Tire Service and Interstate 287 (I-287) to the east. The Site is divided into five main portions: the North, East, West, and South Areas and the Impoundment 8 Facility. The North Area refers to the portion of the Site within the flood control dike; the East Area is east of I-287; the West Area is west of Bufflehead Road; and the South Area is south of the flood control dike and between I-287 and Bufflehead Road.

1.3.1 North Area

The North Area of the Site is approximately 200 acres, is surrounded by a flood protection berm, and includes the former production plant. The North Area is bounded to the north by the New Jersey Transit Railroad, to the south by the Conrail (former Lehigh Valley Railroad) and CSX (former Port Redding) Railroad, to the east by STS Tire Service, and to the west by Cuckel's Brook.

The North Area represents the largest portion of the Site where the majority of historical manufacturing activities occurred. Most of the former structures in the North Area have been removed. Remaining structures include:

- Building 39: water meter and backflow preventer and provides water service to the Site.
- Building 81: formerly provided electric switching apparatus and is currently abandoned.
- Building 104: Bedrock groundwater and storm water pumping station.
- Building 821: Used as a severe weather shelter.
- Building 1023: Field maintenance building.

1.3.2 East Area

The East Area includes the portion of the Site that is east of I-287. This portion of the Site is bounded to the north by Conrail and CSX railroads, to the west by I-287, and to the south and east by the Raritan River. This portion of the Site encompasses approximately 20 acres, and is currently and has been historically undeveloped.

1.3.3 South Area

The South Area is bounded to the north by the Conrail and CSX railroads, to the east by I-287, to the south by the Raritan River and to the west by the New Jersey American Water Company. The South Area includes Impoundments 1, 2, 15, 16, 17, 18, the Historic Drying Bed, and the Impoundment 1 and 2 groundwater recovery system and waste water treatment plant (WWTP).

Impoundments 1 and 2 and the WWTP are part of Operable Unit (OU) 8. These impoundments were used to store acid tar produced as a byproduct from refining light coal oil into benzene, toluene, xylene and naptha solvent. The acid tar materials within the impoundments have generally separated into two layers, a viscous-rubbery (VR) tar layer on top and a hard-crumbly (HC) tar layer at the bottom. A water cap is maintained over the acid tar in each impoundment and synthetic covers have been installed on top of the acid tar and below the water cap. The acid tar within the impoundments is known to contain high concentrations of benzene and other volatile organic compounds. Impoundment 2 will be the location of a pilot study conducted as part of the OU8 Focused Feasibility Study to evaluate treatment alternatives for the acid tar. The pilot study will begin in late 2013. The air monitoring results in the vicinity of these two impoundments are discussed in detail in this report because they represent a potential source of volatile emissions.

1.3.4 West Area

The West Area is bounded to the northwest by the Somerset-Raritan Valley Sewerage Authority (SRVSA), to the east by Cuckel's Brook, to the south by the Conrail and CSX railroads, and to the southwest by the Raritan River. The West Area encompasses approximately 55 acres and was historically the location of the plant's primary wastewater treatment facility. This area originally contained seven impoundments/lagoons which stored wastewater and treatment sludge. Lagoon 7 currently collects and stores stormwater runoff from the Site.

1.3.5 Impoundment 8 Facility

The Impoundment 8 Facility is the portion of the Site located south of the New Jersey Transit railroad and northwest of the North Area. This area of the Site is located near SRVSA, the Somerset County Recycling Center, ATS Wood Recycling, and the Bridgewater Resources Inc. waste transfer station. The Impoundment 8 Facility occupies approximately 35 acres and was historically the location of Impoundment 9 and Lagoons 8, 9A, and 10 and currently incorporates a RCRA Subtitle-C landfill. The Impoundment 8 Facility is also used as the operations center for the Site and includes a waste storage area, security area, office trailers and maintenance garage.

SECTION 2

Sampling Event Activities

The project scope consisted of a Site-wide air monitoring program to assess ambient air quality in the general area and to develop a baseline set of ambient air monitoring data before remedial activities are implemented for both OU4 and OU8. Contaminants of concern identified through this monitoring program included VOCs, polycyclic aromatic hydrocarbons (PAHs), aldehydes, reduced sulfur species, and particulate matter.

Sampling locations were selected to study seasonal variability based on prevailing wind directions, accessibility, and proximity to potential receptors. A QAPP was submitted to USEPA in June 2012 (CH2M HILL 2012a). Twelve sampling locations were approved by USEPA Region 2; eight of these locations (P1 through P8) are along the property fence line (perimeter) of the Site, and the remaining four (C1 through C4) are close to Impoundments 1 and 2 (Figure 2-1).

Ambient air sampling events occurred in July 2012, October 2012, January 2013, and April 2013. Samples were collected for the following parameters:

- TO-15 – VOCs: 24-hour samples
- TO-13A (modified sorbent tube) – SVOCs: 24-hour samples
- TO-11A – aldehydes: 24-hour samples
- ASTM International ¹(ASTM) D5504 – reduced sulfur compounds and hydrogen sulfide: three 20-minute grab samples per location (nine in total for each event)
- Particulate matter less than 10 microns in aerodynamic diameter (PM₁₀) – particle of 10 micrometers or less in diameter: 24-hour samples (for particulate matter, one location near Impoundments 1 and 2)

Supplementary samples for particulate matter were collected at one location (C3) using a DataRAM4 particulate monitor for screening purposes. One 24-hour sample, continuous data collection via Jerome J605 was collected at C3. The samples locations and analytical methods are listed in Table 3-1.

TABLE 2-1
Sample Locations and Associated Analytical Methods
Summary of Ambient Air Monitoring Results – July 2012 to April 2013

Sample Location	Analysis Performed			
	TO-15 (VOCs)	TO-13A (PAHs)	TO-11A (Aldehydes)	ASTM D5504 (Hydrogen Sulfide and Reduced Sulfur Compounds)
P1	X			
P2	X			
P3	X			
P4	X			
P5	X			
P6	X			
P7	X			
P8	X			
C1	X	X	X	X

TABLE 2-1

Sample Locations and Associated Analytical Methods*Summary of Ambient Air Monitoring Results – July 2012 to April 2013*

Sample Location	Analysis Performed			
	TO-15 (VOCs)	TO-13A (PAHs)	TO-11A (Aldehydes)	ASTM D5504 (Hydrogen Sulfide and Reduced Sulfur Compounds)
C2	X	X	X	X
C3	X	X	X	X
C4	X			X

ASTM - American Society for Testing and Materials

All samples for laboratory analysis were analyzed by ALS Environmental laboratory of Simi Valley, California. The data were validated using the *USEPA Contract Laboratory Program, National Functional Guidelines for Organic Data Review* (USEPA 1999). The laboratory data from all four quarters underwent a data quality evaluation to evaluate their suitability for the ambient air monitoring data evaluation that is presented below. Qualifiers applied to the analytical data and their impacts on this data evaluation are discussed in Section 4.

Meteorological data were collected onsite using a RainWise MKIII weather station. The weather station was installed after the January 2013 event at the Impoundment 8 Facility and collects the following data continuously:

- Temperature in degrees Fahrenheit (°F)
- Barometric pressure in millimeters of mercury (mmHg)
- Rainfall in inches
- Humidity in percent
- Wind speed in miles per hour
- Wind direction

SECTION 3

Ambient Air Monitoring Data Evaluation

The results of the first three quarters of the ambient air monitoring data were summarized in three technical memorandums (CH2M HILL 2012b, 2012c, 2013b) previously submitted to USEPA and included here in Appendix A. This section summarizes the 2nd quarter 2013 ambient air monitoring event and the first year of quarterly monitoring at the Site. The laboratory data sheets from the quarterly ambient air monitoring events are found in Appendix B.

3.1 April (2nd Quarter) 2013 Ambient Air Monitoring Summary

The final quarter (2nd Quarter 2013) of ambient air monitoring for this annual period was performed from April 9 to 10, 2013. Samples were collected, handled, shipped, and analyzed according to procedures outlined in the QAPP (CH2M HILL 2012a). Results are presented in Table 3-1, Table 3-2, and the sections below. Wind velocity and direction data at the Site were collected from the weather station located at the Impoundment 8 Facility.

3.1.1 Meteorological Data

Wind speed and direction data from the weather station were used to develop a wind rose depicting the direction and velocity of the wind during the sampling event. Wind roses were prepared for April 9, 2013; April 10, 2013; and for the entire event (April 9 through 10, 2013). The wind roses are depicted as Figures 3-1 through 3-3. On April 9, 2013 winds were predominantly out of the northwest (21% of the day) and north-northwest (21% of the day). In addition, the wind was out of the east on April 9, 2013 for 17% of the day. On April 10, 2013 the winds were predominantly out of the east-southeast (29% of the day). The wind rose depicted on Figure 3-3 provides the wind data for the entire sampling event and indicates that winds were predominantly from the east-northeast and east (more than 30 percent during the sampling event). In addition, the wind blew from the northwest, west-northwest, and west-southwest (about 32 percent during the sampling event). The wind directional data indicate the winds were variable during the sampling event and establishing locations considered upwind and downwind across the Site is not possible. However, some of the locations, including P3, P6, P7 and P8 were downwind of off-Site areas (i.e. upwind from the Site) for the majority of the April 2013 sampling event and anomalies at these data points may have been impacted from off-Site sources.

During the event, the temperatures ranged from 54.6°F to 83.9°F, with an average temperature of 68.3°F. The relative humidity ranged from 17 to 99 percent with an average of 52.9 percent. The barometric pressure ranged from 29.7 to 29.9 mmHg and averaged 29.8 mmHg. A total of 0.6 inch of rain fell during the sampling event.

3.1.2 Volatile Organic Compound Results

Perimeter Locations

Four VOC compounds were detected in the perimeter monitoring locations above the USEPA Regional Screening Levels (RSL) during the 2nd quarter 2013 event: 1,3-butadine, benzene, carbon tetrachloride, and chloroform. The data is depicted in Table 3-1.

TABLE 3-1
2nd Quarter 2013 VOCs with Detections above the RSLs
Summary of Ambient Air Monitoring Results – July 2012 to April 2013

Compound	RSL	Result ($\mu\text{g}/\text{m}^3$)											
		P1	P2	P3	P4	P5	P6	P7	P8	C1	C2	C3	C4
1,3-Butadine	0.081	<0.28	<0.37	3.4	<0.29	<0.30	<0.30	<0.31	<0.31	<0.29	<0.32	<0.28	<0.30
Benzene	0.31	0.69	1.3	12	1.3	1.1	1.2	4.4	6.0	3.7	3.1	4.2	6.3
Carbon Tetrachloride	0.41	0.46	0.38	<0.21	0.55	0.49	0.50	0.50	0.39	0.50	0.54	0.50	0.48

TABLE 3-1

2nd Quarter 2013 VOCs with Detections above the RSLs*Summary of Ambient Air Monitoring Results – July 2012 to April 2013*

Compound	Result ($\mu\text{g}/\text{m}^3$)												
	RSL	P1	P2	P3	P4	P5	P6	P7	P8	C1	C2	C3	C4
Chloroform	0.11	<0.14	0.21	<0.21	0.21	0.56	0.59	0.28	0.32	0.23	0.25	0.24	0.29

RSL = regional screening level

1,3-Butadiene

1,3 butadiene was only detected at location P3 at $3.4 \mu\text{g}/\text{m}^3$ during the 2nd Quarter 2013 sampling event, which is above the RSL of $0.081 \mu\text{g}/\text{m}^3$. The USEPA Urban Air Toxics Monitoring Program (UMATP) has established an urban background in New Jersey for 1,3-butadiene based on data collected from four urban areas in Camden, Chester, Elizabeth, and New Brunswick. The most recent data published are from 2008 and 2009 (USEPA 2011). The UMATP range of daily urban background concentrations of 1,3-butadiene for 2008 and 2009 ranged from 0.03 to $0.16 \mu\text{g}/\text{m}^3$. The data from the on-Site weather station indicate that during the event wind was mainly out of the northwest, north-northwest, east and east-southeast and was blowing from off-Site at location P3. Therefore, the 1,3-butadiene detected at location P3 is likely from an off-Site source.

Benzene

Benzene was detected above the RSL of $0.31 \mu\text{g}/\text{m}^3$ at each of the perimeter sample locations during the 2nd Quarter 2013 event. Perimeter benzene concentrations ranged from $0.69 \mu\text{g}/\text{m}^3$ at location P1 to $12 \mu\text{g}/\text{m}^3$ at location P3. The average perimeter sample benzene concentration was $3.5 \mu\text{g}/\text{m}^3$. The samples collected from locations P3, P7, and P8 contained concentrations of benzene above the UMAPT daily average urban background concentration range. No on-Site activities were occurring in the area of location P3 during the sampling event. In addition, the on-Site weather station indicates that during the event winds were predominantly out of the northwest, north-northwest, east, and east-southeast, indicating the benzene detected at this location likely originated off-Site.

Location P8 is the westernmost sampling station, and location P7 is the next station to the east (Figure 2-1). Sources of emissions near these locations were not noted during the sampling event and Site related activities did not occur near these locations during the event. Based on the wind directions recorded by the on-Site weather station during the April 2013 event, it is likely these stations were also impacted by an off-Site source.

Carbon Tetrachloride

Carbon tetrachloride was detected in air samples collected from 7 of the 8 perimeter locations and was detected above the RSL of $0.41 \mu\text{g}/\text{m}^3$ at 5 locations (P1, P4, P5, P6, and P7). The carbon tetrachloride results ranged from not detected at $0.21 \mu\text{g}/\text{m}^3$ at location P3 to $0.55 \mu\text{g}/\text{m}^3$ at location P4. The average concentration of carbon tetrachloride in the perimeter samples was $0.44 \mu\text{g}/\text{m}^3$. The occurrence of carbon tetrachloride is not related to the occurrence of either 1,3-benzadiene or benzene at location P3, since this compound was not detected at this location. The distribution of the Site wide carbon tetrachloride detections at the sampling locations cannot be correlated to the wind direction due to the variability during the event. However, as indicated in Section 3.1.1, the detections at location P6 and P7 may be attributed to an off-Site source. The concentration of carbon tetrachloride at all sampling locations is below the UMAPT average daily urban background concentration for New Jersey for 2008 – 2009 of 0.64 to $0.67 \mu\text{g}/\text{m}^3$.

Chloroform

Chloroform was detected in 6 of the 8 perimeter samples collected during the 2nd Quarter of 2013 and each chloroform detection was above the RSL of $0.11 \mu\text{g}/\text{m}^3$. The chloroform data ranges from not detected at $0.14 \mu\text{g}/\text{m}^3$ at location P1 to $0.59 \mu\text{g}/\text{m}^3$ at location P6. The average chloroform concentration detected in the samples was $0.18 \mu\text{g}/\text{m}^3$. Chloroform was not detected at location P3 and is not associated with the source of benzene and

1,3-butadiene in the area. The concentration of chloroform was the greatest in the samples collected from the southern border of the Site. The concentrations in the samples collected from P5 and P6 were roughly twice the concentrations detected from other sampling locations. As described in Section 3.1.1, based on the predominant wind direction during the 2nd Quarter 2013 event, the chloroform detection at locations P6 and P7 can be attributed to off-Site sources. The sample from location P6 contained the highest concentration of chloroform detected during the event. Since the highest concentration of chloroform was detected at a location that was likely impacted from off-Site sources, it is reasonable to assume the chloroform detections across the Site are associated with off-Site source.

Impoundment Locations

Three VOCs were detected in the ambient air samples collected around the impoundments including: benzene, carbon tetrachloride, and chloroform.

Benzene

Ambient air benzene concentrations ranged from 3.1 $\mu\text{g}/\text{m}^3$ at location C2 to 6.3 $\mu\text{g}/\text{m}^3$ at location C4, which is above the RSL of 0.31 $\mu\text{g}/\text{m}^3$. The benzene concentration range of the impoundment samples is above the UATMP daily average urban background concentration range for 2008 to 2009 of 0.56 to 1.83 $\mu\text{g}/\text{m}^3$ but below the 34.1 $\mu\text{g}/\text{m}^3$ maximum urban background concentration. The average concentration of benzene in the impoundment samples was 4.3 $\mu\text{g}/\text{m}^3$ which is slightly higher than the average benzene concentration detected in the perimeter samples of 3.5 $\mu\text{g}/\text{m}^3$.

Carbon Tetrachloride

Carbon tetrachloride detected in the impoundment samples ranged from 0.48 $\mu\text{g}/\text{m}^3$ at location C2 to 0.54 $\mu\text{g}/\text{m}^3$ at location C2 which are above the RSL of 0.41 $\mu\text{g}/\text{m}^3$. The average concentration of carbon tetrachloride in the impoundment sample was 0.51 $\mu\text{g}/\text{m}^3$ compared to the average concentration detected in the perimeter samples of 0.44 $\mu\text{g}/\text{m}^3$. The concentration range for carbon tetrachloride at the impoundment samples was tight and the average concentration detected was similar to the average concentration detected in the perimeter samples. Therefore, it is likely that the detections of carbon tetrachloride at the impoundments is a result of urban background. The UATMP range of daily average urban background concentrations for carbon tetrachloride for 2008 to 2009 is 0.64 to 0.72 $\mu\text{g}/\text{m}^3$, which is greater than any of the concentrations detected at the impoundment locations during the April 2013 event.

Chloroform

The chloroform concentration detected in the 2nd Quarter air samples from the four impoundment locations ranged from 0.23 $\mu\text{g}/\text{m}^3$ at location C1 to 0.29 $\mu\text{g}/\text{m}^3$ at location C4, which are above the RSL of 0.11 $\mu\text{g}/\text{m}^3$. The average concentration of chloroform detected in the impoundment samples was 0.25 $\mu\text{g}/\text{m}^3$. The average chloroform concentration detected in the impoundment samples was slightly less than the average chloroform concentration detected in of the perimeter sampling locations (0.36 $\mu\text{g}/\text{m}^3$). As indicated in the perimeter location section, the chloroform detections at the Site are likely attributed to off-Site sources.

3.1.3 Polycyclic Aromatic Hydrocarbon Results

PAHs were not detected in any samples analyzed using USEPA Method TO-13A. Naphthalene was detected in two perimeter samples analyzed using USEPA Method TO-15. Naphthalene was detected above its RSL of 0.072 $\mu\text{g}/\text{m}^3$ at 1.2 $\mu\text{g}/\text{m}^3$ at station P2 and 0.78 $\mu\text{g}/\text{m}^3$ at station P8. Naphthalene is likely not associated with the off-Site source of benzene and 1,3-butadiene detected at location P3 since it was not detected in the P3 sample. As described in Section 3.1.1, the naphthalene detected at location P8 may be attributed to an off-Site source. The concentration of naphthalene detected in the samples values fall within the nation-wide range of naphthalene concentration in air measured during the 2008-2009 UATMP (0.004 to 3.2 $\mu\text{g}/\text{m}^3$).

3.1.4 Aldehyde Results

Ambient air samples for aldehydes were only collected from the three impoundment locations indicated in Table 2-1. Formaldehyde and acetaldehyde were detected at concentrations above the RSLs in each sample during the fourth quarter event.

TABLE 3-2

Aldehydes with Detections above the RSLs

Summary of Ambient Air Monitoring Results – July 2012 to April 2013

Compound	RSL	Result ($\mu\text{g}/\text{m}^3$)			
		C1	C2	C3	C3(duplicate)
Acetaldehyde	1.1	7.4	6.0	1.4	3.5
Formaldehyde	0.19	1.6.	2.3	1.5	1.3

Aldehyde sampling is conducted using tubes that are packed with sorbent materials. Air is pulled through the sorbent within the tubes at a known rate, and the mass of aldehydes sorbed onto the sorbent is measured. All of the detected formaldehyde and acetaldehyde samples had breakthrough in the sampling tube sorbent media. Breakthrough occurs when the concentrations of the compound sorbed in the back half of the sampling tube are greater than 10 percent of the concentrations sorbed to the sorbent in the front half of the sample tube. These results are estimated (J-qualified).

The ambient air samples collected in April 2013 contained acetaldehyde concentrations ranging from $1.4 \mu\text{g}/\text{m}^3$ at location C3 to $7.4 \mu\text{g}/\text{m}^3$ at location C1. The daily average urban background concentration for acetaldehyde in 2008 and 2009 ranged from $1.34 \mu\text{g}/\text{m}^3$ to $2.58 \mu\text{g}/\text{m}^3$. The concentrations of acetaldehyde are not considered to be significantly elevated at the impoundments, and concentrations above the urban background (ranging from $0.05 \mu\text{g}/\text{m}^3$ to $24.1 \mu\text{g}/\text{m}^3$ nationwide) are not expected at the perimeter of the Site.

The concentration of formaldehyde detected at the impoundment ambient air sampling locations ranged from $1.5 \mu\text{g}/\text{m}^3$ at location C3 to $2.3 \mu\text{g}/\text{m}^3$ at location C2. The daily average urban background concentration for acetaldehyde in 2008 and 2009 ranged from $1.47 \mu\text{g}/\text{m}^3$ to $3.8 \mu\text{g}/\text{m}^3$. Concentrations of formaldehyde in the ambient air samples collected from around the impoundments in April 2013 are within or near the urban background for New Jersey.

3.1.5 Particulate Matter

Particulate matter was collected at location C3 and was not detected at the method reporting limit of 0.64 milligram per cubic meter.

3.1.6 Reduced Sulfur Compounds

Reduced sulfur compounds, including hydrogen sulfide, were not detected in any samples during the April 2013 event.

3.2 Ambient Air Monitoring Annual Summary

Between July 2012 (3rd Quarter 2012) and April 2013 (2nd Quarter 2013), ambient air samples were collected quarterly from eight perimeter locations and four impoundment location at the Site. Sampling locations were selected to study seasonal variability based on prevailing wind directions, accessibility, and proximity to potential receptors. Results of the ambient air sampling are described in the following sections. On-Site meteorological data was limited during the first year of ambient air monitoring because the weather station at the Impoundment 8 Facility was not installed until after the January 2013 event.

3.2.1 Volatile Organic Compounds

The VOC data for the ambient air sampling events are provided in Appendix C. A total of 32 perimeter air samples and 20 impoundment samples (including 4 duplicate samples) were collected during the ambient air sampling events. The following VOCs were detected above their respective RSLs during the four quarterly events:

- 1,2-Dichloroethane
- 1,3-Butadiene
- 1,4-Dichlorobenzene
- Benzene
- Carbon tetrachloride
- Chloroform
- Ethylbenzene
- Naphthalene
- Vinyl chloride

The major constituent VOCs are depicted on a Site map on Figure 3-4.

Perimeter Volatile Organic Compounds

Of the nine VOCs detected above the RSLs during the quarterly sampling naphthalene and vinyl chloride were detected infrequently. The naphthalene results are described in Section 3.2.3. Vinyl chloride was detected once at location P6 ($0.17 \mu\text{g}/\text{m}^3$) during the July 2012 sampling event.

1,2-Dichloroethane

1,2-Dichlorethane was only detected at the perimeter sampling locations during the October 2012 sampling event. During that event the concentration of 1,2-dichloroethane ranged from $0.26 \mu\text{g}/\text{m}^3$ at location P5 to $5.6 \mu\text{g}/\text{m}^3$ at location P3. The October 2012 sampling data indicate a general increase of VOCs concentration at all sampling locations across the Site which cannot be attributed to a specific on-Site or off-Site source. The most likely explanation is that the VOC background was elevated during this event because the number of VOCs detected and concentration of VOCs were elevated Site wide.

1,3-Butadiene

Out of the 32 perimeter air samples collected during the quarterly sampling, 1,3-butadiene was detected in 11 samples, each above the RSL of $0.081 \mu\text{g}/\text{m}^3$. A graph depicting the 1,3-butadiene data is found as Figure 3-5. The October 2012 event resulted in the most frequent detections of 1,3-butadiene, which was detected at each perimeter location during this event. The data indicated 1,3-butadiene in the samples ranged from not detected at $0.26 \mu\text{g}/\text{m}^3$ at location P7 in January 2013 to $3.4 \mu\text{g}/\text{m}^3$ at location P3 during the April 2013 event. As described in the previous section, the VOC background for the Bridgewater area is believed to have been elevated during the October 2012 sampling event. The elevated 1,3-butadiene concentration detected during April 2013 at location P3 is likely attributed to a nearby off-Site source as described in Section 3.1.2.

1,4-Dichlorobenzene

1,4-Dichlorobenzene was detected at concentrations above its RSL of $0.22 \mu\text{g}/\text{m}^3$ in eight of the 32 samples collected during the quarterly sampling events. The data are represented graphically on Figure 3-6. Each of the RSL exceedances was recorded during the October 2012 event. During the sampling events, the 1,4-dichlorobenzene concentration in the samples ranged from not detected at $0.13 \mu\text{g}/\text{m}^3$ at location P7 during the January 2013 event to $0.36 \mu\text{g}/\text{m}^3$ at locations P7 and P8 during the October 2012 event. The average 1,4-dichlorobenzene concentration in the October 2012 ambient air samples was $0.32 \mu\text{g}/\text{m}^3$. The October 2012 event was the only sampling event that recorded concentrations of 1,4-dichlorobenzene above the reporting limits.

Benzene

Benzene was detected above its RSL of $0.31 \mu\text{g}/\text{m}^3$ at each perimeter sampling location during each sampling event. The concentrations of benzene in the ambient air samples ranged from $0.55 \mu\text{g}/\text{m}^3$ at location P2 in July

2012 to 12 $\mu\text{g}/\text{m}^3$ at location P3 in April 2013. The average benzene concentration from all samples collected during the four quarterly events is 2.2 $\mu\text{g}/\text{m}^3$. A graph depicting the concentration of benzene detected in each of the perimeter samples during each event is provided on Figure 3-7. Generally, the concentration of benzene detected in the ambient air samples was within or near the New Jersey daily average urban background. The samples from location P3 typically contained the highest concentrations of benzene, which may be a result of the P3 being near a train station and baseball field parking lot. The elevated benzene concentration detected at location P3 during the April 2013 event is believed to be associated with an off-Site source as described in Section 3.1.2.

Carbon Tetrachloride

Carbon tetrachloride was detected in 31 of the 32 perimeter air samples collected during the quarterly events. Carbon tetrachloride was detected above the RSL of 0.41 $\mu\text{g}/\text{m}^3$ in 27 samples during the four quarterly events. The data indicate that carbon tetrachloride in the Site samples ranges from not detected at 0.21 $\mu\text{g}/\text{m}^3$ at location P3 during the April 2013 event to 0.62 $\mu\text{g}/\text{m}^3$ at location P3 during the July 2012 event. The average concentration of carbon tetrachloride is 0.46 $\mu\text{g}/\text{m}^3$. A graph with the carbon tetrachloride data from the quarterly events is located in Figure 3-8. All of the perimeter samples collected contain concentrations of carbon tetrachloride below the 2008 to 2009 range of daily urban background concentration for New Jersey.

Chloroform

Chloroform was detected above the RSL of 0.11 $\mu\text{g}/\text{m}^3$ in 30 of the 32 perimeter air samples collected during the quarterly sampling events. Figure 3-9 depicts the chloroform concentration in the perimeter air samples. The concentration of chloroform is not consistently elevated at any perimeter location; however, the samples collected from location P1 contained the lowest concentration of chloroform. Generally, changes in chloroform concentration occur Site wide; however, the magnitude of the change is not consistent. This is likely the result of changes to the background for chloroform in the area.

Ethylbenzene

Ethylbenzene was detected in 15 of the quarterly samples and was detected above its RSL of 0.97 $\mu\text{g}/\text{m}^3$ in five of the 32 perimeter samples during the quarterly events. Four of the detections above the RSL occurred during the July 2012 sampling event at locations P1, P2, P3, and P8. The other ethylbenzene detection above the RSL was at location P3 in October 2012. The ethylbenzene concentration in the quarterly ambient air samples ranged from not detected at 0.66 $\mu\text{g}/\text{m}^3$ at location P7 during January 2013 to 7.5 $\mu\text{g}/\text{m}^3$ at location P3 during October 2012. The average ethylbenzene concentration in the perimeter ambient air samples, including non-detectable concentrations at the reporting limit was 1.1 $\mu\text{g}/\text{m}^3$.

With the exception of the October 2012 sample from location P3, the ethylbenzene concentrations in the samples are near the RSL of 0.97 $\mu\text{g}/\text{m}^3$. As previously described, the location P3 believed to be affected by VOCs from the nearby baseball stadium and transit station. The quarterly ethylbenzene data are plotted on Figure 3-10.

Impoundment Volatile Organic Compounds

A total of 7 VOC compounds were detected in the impoundment sampling locations during the quarterly sampling events and include:

- 1,2-Dichloroethane
- 1,3-Butadiene
- 1,4-Dichlorobenzene
- Benzene
- Carbon tetrachloride
- Chloroform
- Ethylbenzene
- Naphthalene

Naphthalene was reported in the TO-15 method as a VOC; however, it is discussed in Section 3.2.3.

1,2-Dichloroethane

As was observed in the perimeter sampling locations, 1,2-Dichlorethane was only detected at the impoundment sampling locations during the October 2012 sampling event. During this event the concentration of 1,2-dichloroethane ranged from 0.17 µg/m³ at location C3 to 2.1 µg/m³ at location C4. The average concentration of 1,2-dichloroethane in the impoundment samples from October 2012 was 0.67 µg/m³ and the average concentration in the perimeter samples was 1.0 µg/m³. Data from the October 2012 samples indicate a general increase of VOCs across the Site which cannot be attributed to a specific on-Site or of-Site source. The most likely explanation is that the VOC background was elevated during this event because the number of VOCs detected and concentration was elevated Site wide.

1,3-Butadiene

1,3-butadiene was only detected in the samples collected from the impoundment locations during the October 2013 sampling event. During that event, the 1,3-butadiene concentration ranged from 0.35 µg/m³ at location C1 to 0.63 µg/m³ at location C4. The average concentration of 1,3-butadiene at the impoundment sampling locations during the October 2012 event was 0.51 µg/m³, while the average concentration at the perimeter locations during this event was 0.50 µg/m³. The elevated VOC concentrations during the October 2012 event are attributed to an area wide increase in air VOC concentrations.

1,4-Dichlorobenzene

As was observed in the perimeter sampling locations, 1,4-Dichlorobenzene was also only detected during the October 2012 sampling event and was detected at concentrations above its RSL of 0.22 µg/m³ in five of the 20 (including duplicate samples) samples collected. Each of the RSL exceedances was recorded during the October 2012 event. During the sampling events, the 1,4-dichlorobenzene concentration in the samples ranged from not detected at 0.14 µg/m³ at location C4 during the January 2013 event to 0.38 µg/m³ at location C1 during the October 2012 event. The average 1,4-dichlorobenzene concentration detected in the ambient air samples collected from the impoundment locations was 0.37 µg/m³ which was near the average concentration detected in the perimeter samples of 0.32 µg/m³.

Benzene

Benzene was detected above its RSL of 0.31 µg/m³ in each of the samples collected from the impoundment locations during the sampling events. The data are depicted on Figure 3-11. The concentrations of benzene in the impoundment ambient air samples ranged from 0.80 µg/m³ at location C1 in July 2012 to 33 µg/m³ at location C4 in October 2012. The average benzene concentration from all samples collected during the four quarterly events was 5.1 µg/m³. Generally, the highest concentration of benzene was detected at location C4. The results indicated that most of the samples collected from the impoundment locations contained benzene above the 2008 and 2009 UMAPT range of urban background concentrations, but detections above the maximum urban background concentration of 34.1 µg/m³ were not recorded during any of the sampling events.

The elevated concentration of benzene at location C4 was investigated during the January 2013 sampling event. During this event, four additional VOC samples were collected around location C4, and screening was conducted to identify a source of benzene in the area. The details of the investigation and results are documented in the *Summary of Ambient Air Monitoring Results, 1st Quarter 2013 Sampling Event, American Cyanamid Superfund Site, Bridgewater, New Jersey* (CH2M HILL 2013b). The investigation did not identify a source of benzene in the area.

Carbon Tetrachloride

Carbon tetrachloride was detected in each of the 20 samples (including duplicate samples) collected from the impoundment locations and 18 of the samples contained concentrations of carbon tetrachloride above the RSL of 0.41 µg/m³. The quarterly carbon tetrachloride data is depicted on Figure 3-12. The concentration of carbon tetrachloride ranged from 0.32 µg/m³ at location C2 in January 2013 to 0.55 µg/m³ at location C1 in October 2012. The average carbon tetrachloride concentration in the impoundment samples was 0.46 µg/m³ which is the same

as the perimeter average concentration. All of the impoundment samples collected contain concentrations of carbon tetrachloride below the 2008 to 2009 range of daily urban background concentration for New Jersey.

Chloroform

Chloroform was detected above the RSL of $0.11 \mu\text{g}/\text{m}^3$ in each of the 20 quarterly samples (including duplicate samples) collected from the impoundment locations. The chloroform concentration at the impoundment locations ranged from $0.17 \mu\text{g}/\text{m}^3$ in the duplicate sample collected at location C3 in July 2012 to $0.29 \mu\text{g}/\text{m}^3$ at location C4 in April 2013. The average chloroform concentration in the impoundment samples during the quarterly monitoring events was $0.20 \mu\text{g}/\text{m}^3$ which is slightly less than the average concentration detected at the perimeter locations. The chloroform data from the impoundment locations is located in Figure 3-13. The samples collected from location C4 consistently contained the highest concentration of chloroform.

Ethylbenzene

The impoundment locations ethylbenzene data for the quarterly sampling events are shown on Figure 3-14. Ethylbenzene was detected above its RSL of $0.97 \mu\text{g}/\text{m}^3$ in five of the 20 samples (including duplicate samples) collected. Exceedances of the RSL for ethylbenzene occurred at locations C1 and C2 during the July 2012 event and at locations C2, C3 (duplicate), and C4 during the October 2012 event. The ethylbenzene concentration in the quarterly ambient air samples ranged from not detected at $0.67 \mu\text{g}/\text{m}^3$ at location C3 during January 2013 to $5.5 \mu\text{g}/\text{m}^3$ at location C4 during October 2012. The average ethylbenzene concentration in the ambient air samples, including non-detectable concentrations at the reporting limit, was $1.1 \mu\text{g}/\text{m}^3$, which was equal to the perimeter sample average. Generally, the impoundment location ethylbenzene data indicate concentrations are at or near the RSL, with the exception of the October 2012 sample at location C4. As previously discussed, the source of the elevated VOCs across the Site during the October 2012 event is most likely associated with an area wide elevated VOC background.

3.2.2 Aldehydes

Samples for aldehydes were collected from the impoundment locations C1 through C3 and a duplicate sample was collected from location C3. The aldehyde data from the four ambient air sampling events are provided in Appendix C. During the monitoring events, two aldehydes were detected above their respective RSLs:

- Acetaldehyde
- Formaldehyde

The aldehyde distribution in the impoundment samples is depicted on a Site map on Figure 3-15. Samples for aldehyde analysis were only collected from the impoundment locations. The aldehyde sampling has been affected by excess moisture that was pulled into the sorbent tubes and has interfered with sample analysis. In addition, sorbent tube compound breakthrough, as described in Section 2.1.4, also has been an issue.

Acetaldehyde

Acetaldehyde was detected above its RSL of $1.1 \mu\text{g}/\text{m}^3$ in 11 of the 20 samples collected during the sampling events. Data was not obtained from five samples collected during the events as a result of sampling media problems described in Section 3.1.4. The concentration of acetaldehyde ranged from not detected at $0.86 \mu\text{g}/\text{m}^3$ at location C3 during the October 2013 sampling event to $7.4 \mu\text{g}/\text{m}^3$ at location C1 during the April 2013 sampling event. The average concentration of acetaldehyde detected during the sampling events is $3.3 \mu\text{g}/\text{m}^3$. The acetaldehyde data are depicted on Figure 3-16. The highest concentration of acetaldehyde was consistently recorded in samples collected from location C1. The data indicate that acetaldehyde concentrations in the ambient air around the impoundments are at or near the 2008-2009 range of daily average nationwide urban background (0.05 to $24.1 \mu\text{g}/\text{m}^3$) for New Jersey. Acetaldehyde was not elevated during the October 2012 event and was not associated with the elevated VOC concentrations detected across the Site during this sampling event.

Formaldehyde

Formaldehyde was detected above its RSL of $0.19 \mu\text{g}/\text{m}^3$ in 12 of the 20 samples collected during the sampling events. Data was not obtained from five samples collected during the events as a result of sampling media

problems described in Section 3.1.4. The sampling data indicate the highest formaldehyde concentrations were detected in either C1 or C2. The formaldehyde concentration during the four quarterly sampling events ranged from not detected at 0.055 $\mu\text{g}/\text{m}^3$ at location C3 (duplicate) during the October 2012 event to 13 $\mu\text{g}/\text{m}^3$ at location C1 during the January 2013 event. The average concentration of formaldehyde detected during the sampling events was 2.8 $\mu\text{g}/\text{m}^3$. The formaldehyde data are shown on Figure 3-17. Generally, formaldehyde was either within or below the 2008-2009 range of daily average urban background for New Jersey of 1.47 to 3.80 $\mu\text{g}/\text{m}^3$, with the exception of the January 2013 samples from locations C1 and C2; however, these results fall within the nationwide background for formaldehyde (0.017 to 498 $\mu\text{g}/\text{m}^3$). Formaldehyde was not elevated during the October 2012 event and was not associated with the elevated VOC concentrations detected across the Site during this sampling event.

3.2.3 Polycyclic Aromatic Hydrocarbons

The PAH data using Method TO-13A from the ambient sampling events are provided in Appendix C. Data for naphthalene using Method TO-15 also are listed in Table 2-1. PAHs have not been detected at the method reporting limits during any of the sampling events. Naphthalene has been detected using Method TO-15 and is discussed below.

Perimeter Naphthalene

Naphthalene was detected sporadically in the perimeter air samples during the four quarterly events. Detections occurred at location P3 during the October 2012 event and at locations P2 and P3 during the April 2013 event. The naphthalene data from the sampling locations ranged from not detected at 0.66 $\mu\text{g}/\text{m}^3$ at location P7 during the January 2013 event to 2.2 $\mu\text{g}/\text{m}^3$ at location P3 during the October 2012 event. These concentrations fall within the nationwide range of background (0.004 to 3.2 $\mu\text{g}/\text{m}^3$). The perimeter sample naphthalene data are shown on Figure 3-18.

Impoundment Naphthalene

Naphthalene was only detected at 3 $\mu\text{g}/\text{m}^3$ at location C4 during the October 2012 event. This detection likely is associated with the source of VOCs detected at this location during the October 2012 event.

3.2.4 Reduced Sulfur

Reduced sulfur data were collected using Method ASTM-5504 from the impoundment locations and are provided in Appendix C. Hydrogen sulfide was the only reduced sulfur compound detected during the quarterly monitoring events and was detected in one sample (location C1) at 23 $\mu\text{g}/\text{m}^3$ during the January 2013 sampling event.

3.2.5 Particulate Matter

Particulate matter data for the monitoring events are provided in the appendix. PM_{10} was measured from location C3. Particulates were detected at 1 milligram per cubic meter during the October 2012 sampling event. During the remaining events, particulates were detected below the method reporting limits. The PM_{10} results are provided in Appendix C.

Conclusions

The data indicate the Site is not a significant source of air emissions beyond the New Jersey urban background levels. The highest concentrations of petroleum-related (benzene, ethylbenzene, and naphthalene) generally were detected at location P3 during the April 2013 sampling event, which may be affected from emissions associated with vehicles at the baseball stadium and railway station.

The on-Site wind direction data collected during the April 2013 sampling event indicated the winds were variable, which prevented identification of all perimeter locations as either upwind or downwind. The wind blew predominantly from four directions (northwest, north-northwest, east, and east-southeast) which allowed selected perimeter locations; including P3, P6, P7, and P8, to be interpreted as being downwind from off-Site sources for the majority of the April 2013 event. Locations P3, P7, and P8 appear to have been impacted by an off-Site source of benzene during the 2013 sampling event. The sample from location P3 also contained elevated concentration of 1,3-butadiene. In addition, location P6 and P7 may have been impacted by an off-site source of chloroform during the April 2013 event. Since the chloroform concentration was highest at upwind location P6, it is reasonable to conclude that the chloroform detected across the Site is from off-Site sources.

The average concentration of benzene detected in the four impoundment sampling locations was higher than the average benzene concentration detected in the eight perimeter sampling locations. However, the impoundment location data were affected by the one high concentration ($33 \mu\text{g}/\text{m}^3$) at location C4 in October 2012. The benzene was not detected above the maximum urban background concentration of $34.1 \mu\text{g}/\text{m}^3$ during any of the sampling events. In addition, the data indicate that during the October 2012 sampling event, the area wide VOC concentration in the background air was elevated.

The highest concentrations of aldehydes were detected during the January 2013 sampling event at locations C1 and C2. There was some correlation between acetaldehyde and formaldehyde concentrations in air during the first three sampling events. Generally, if the concentration of acetaldehyde increased in the samples during an event, the concentration of formaldehyde also increased in the samples, but this was not observed during the April 2013 event, where acetaldehyde and formaldehyde concentrations were not correlated. The aldehyde results need to be viewed with caution, because of high sampling and analytical variability. Formaldehyde and acetaldehyde exhibited breakthrough in some samples, indicating these analytes may not have been quantitatively trapped on the sampling media, producing results that are biased low. A possible cause for this high variability is high humidity during sampling. The sampling method used (EPA TO-11A) is less effective in trapping aldehydes in air under conditions of high humidity. Further evaluation of the sampling method is being conducted to identify improvements.

The current sampling network is adequate to continue monitoring the ambient air data across the Site and will assist in evaluating the affect the pilot study will have on air quality at the perimeter and impoundments during its execution. Monitoring locations C1 through C4 may require adjustment during implementation of the OU8 FFS field pilot demonstration that will likely occur during the 1st Quarter 2014 monitoring event.

SECTION 5

References

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- CH2M HILL. 2012b. *Summary of Ambient Air Monitoring Results, 1st Quarter 2013 Sampling Event, American Cyanamid Superfund Site, Bridgewater, New Jersey*.
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Figures

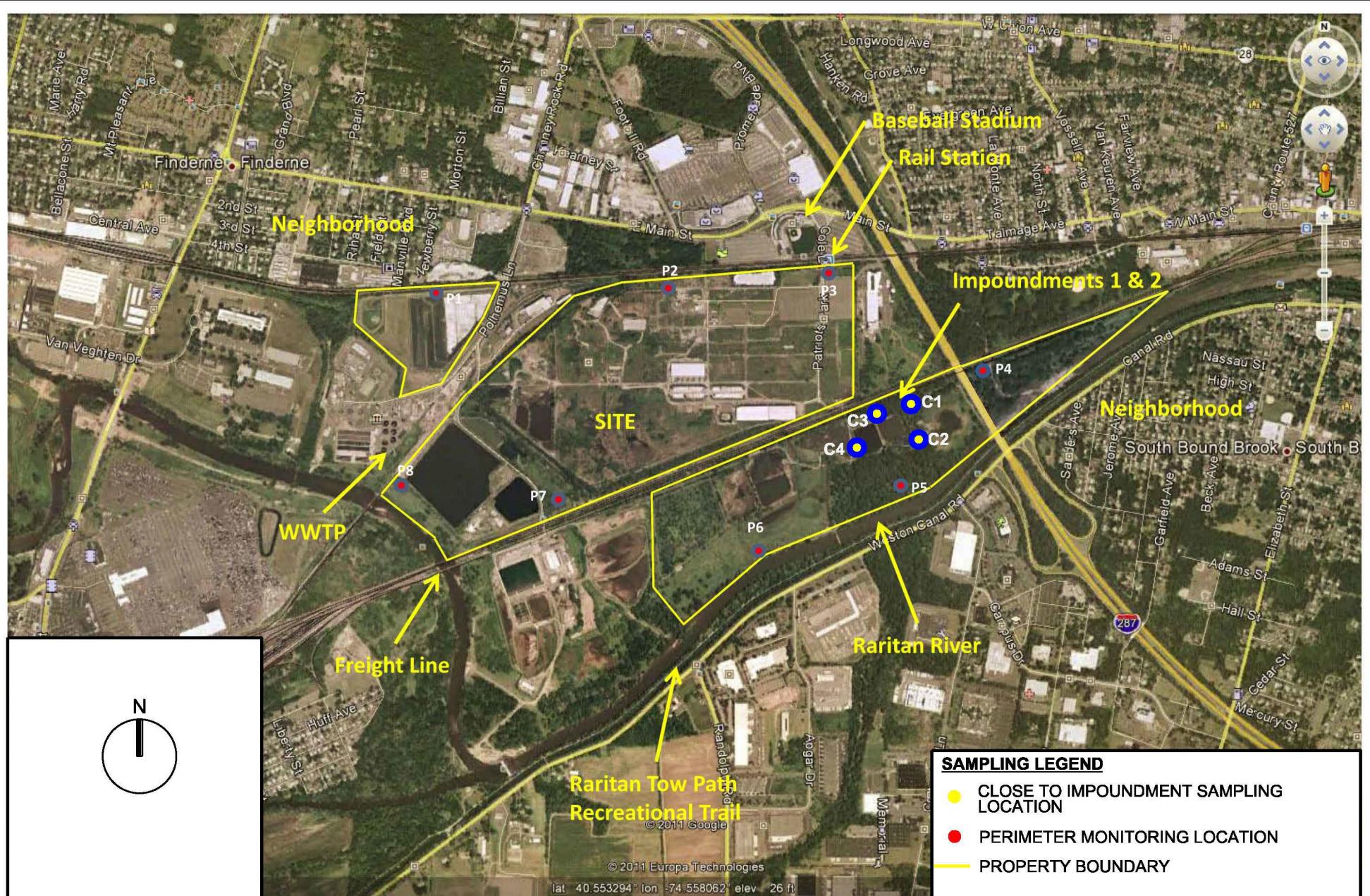


Figure 2-1
Ambient Air Monitoring Locations
American Cyanamid Superfund Site
Bridgewater, New Jersey

CH2MHILL

FIGURE 3-1

On-Site Wind Rose for April 9, 2013

American Cyanamid Site, Bridgewater, New Jersey

Summary Ambient Air Monitoring Results- July 2012 to April 2013

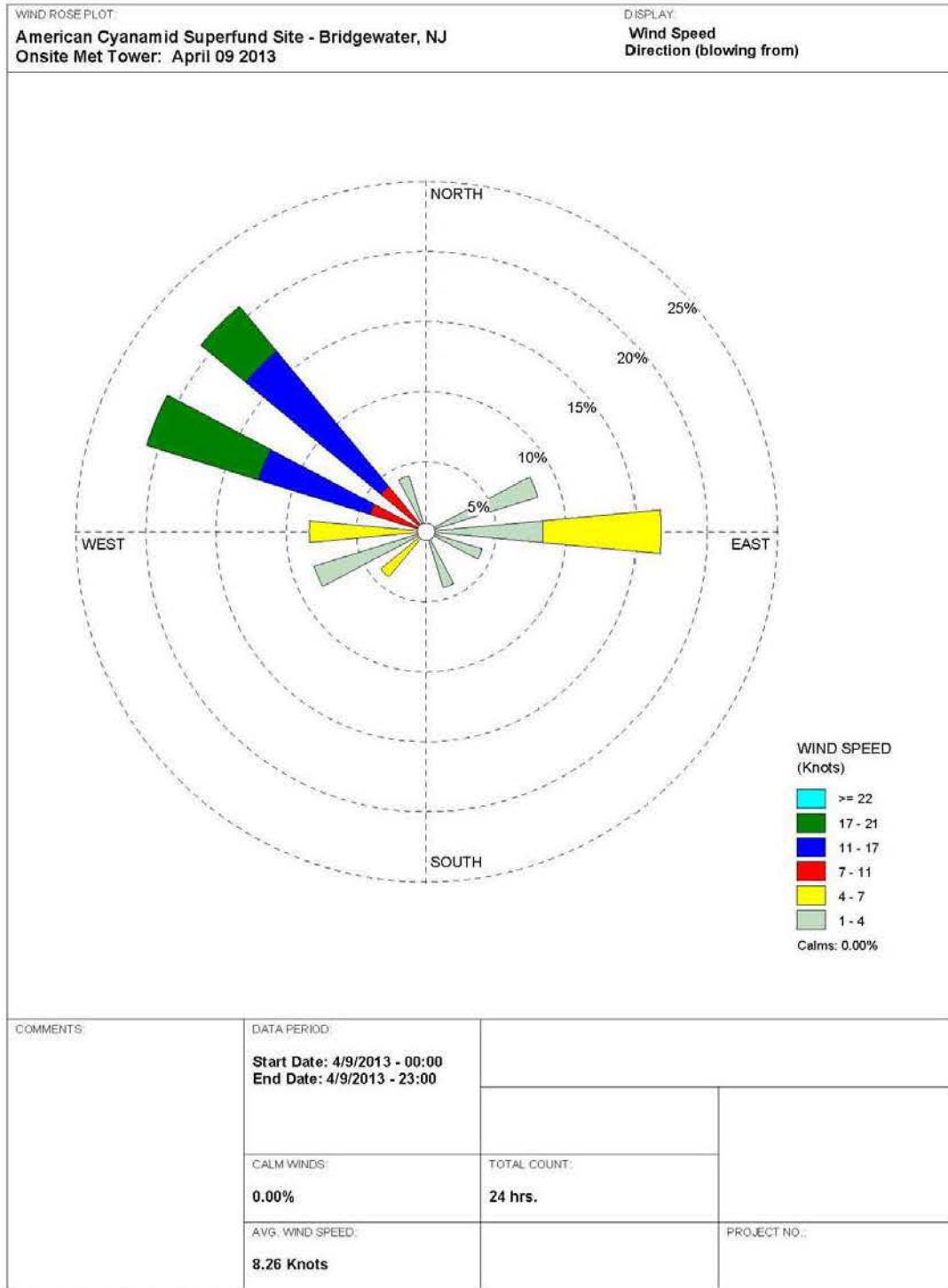


FIGURE 3-2

On-Site Wind Rose for April 10, 2013

American Cyanamid Site, Bridgewater, New Jersey

Summary Ambient Air Monitoring Results- July 2012 to April 2013

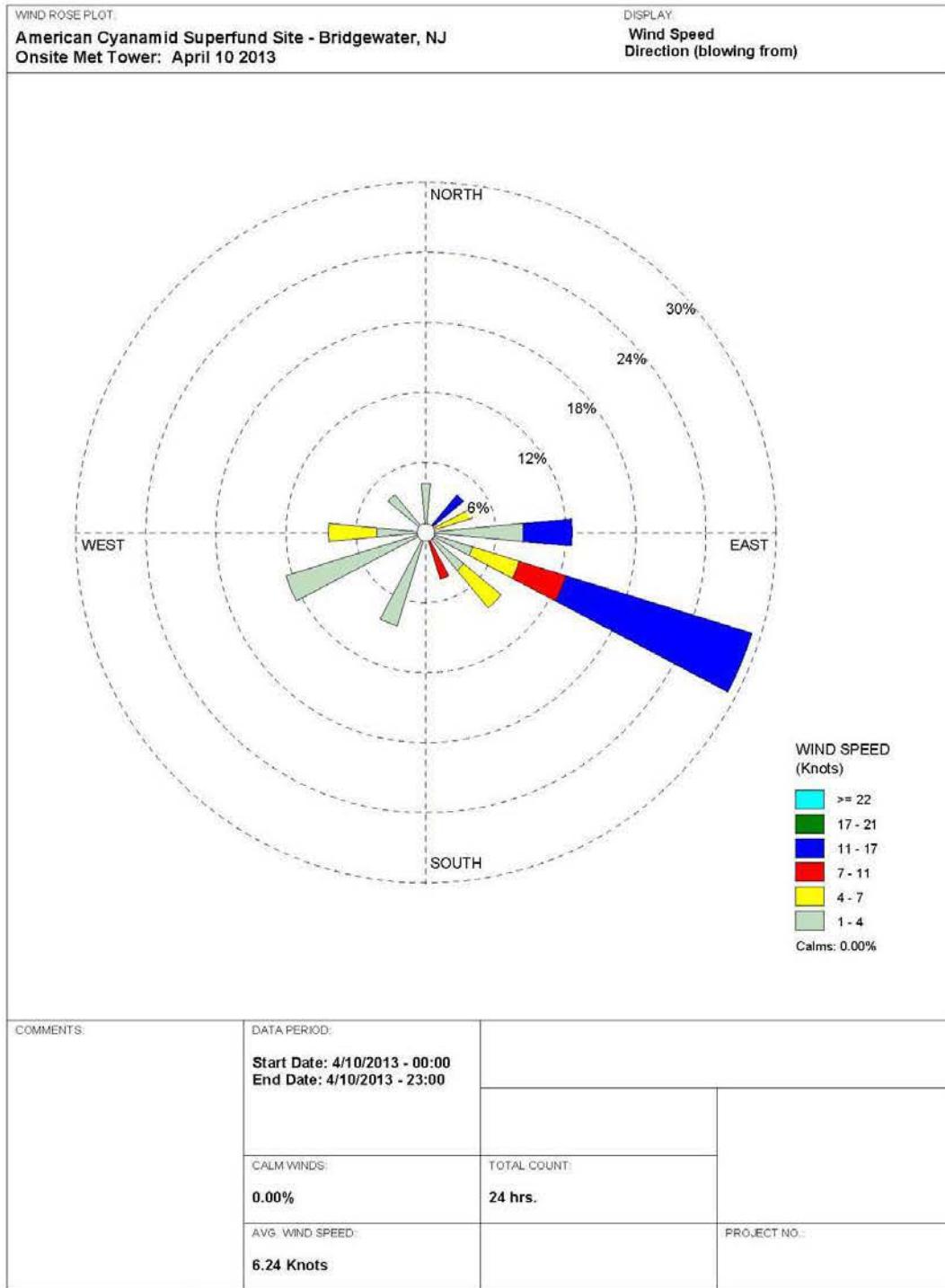
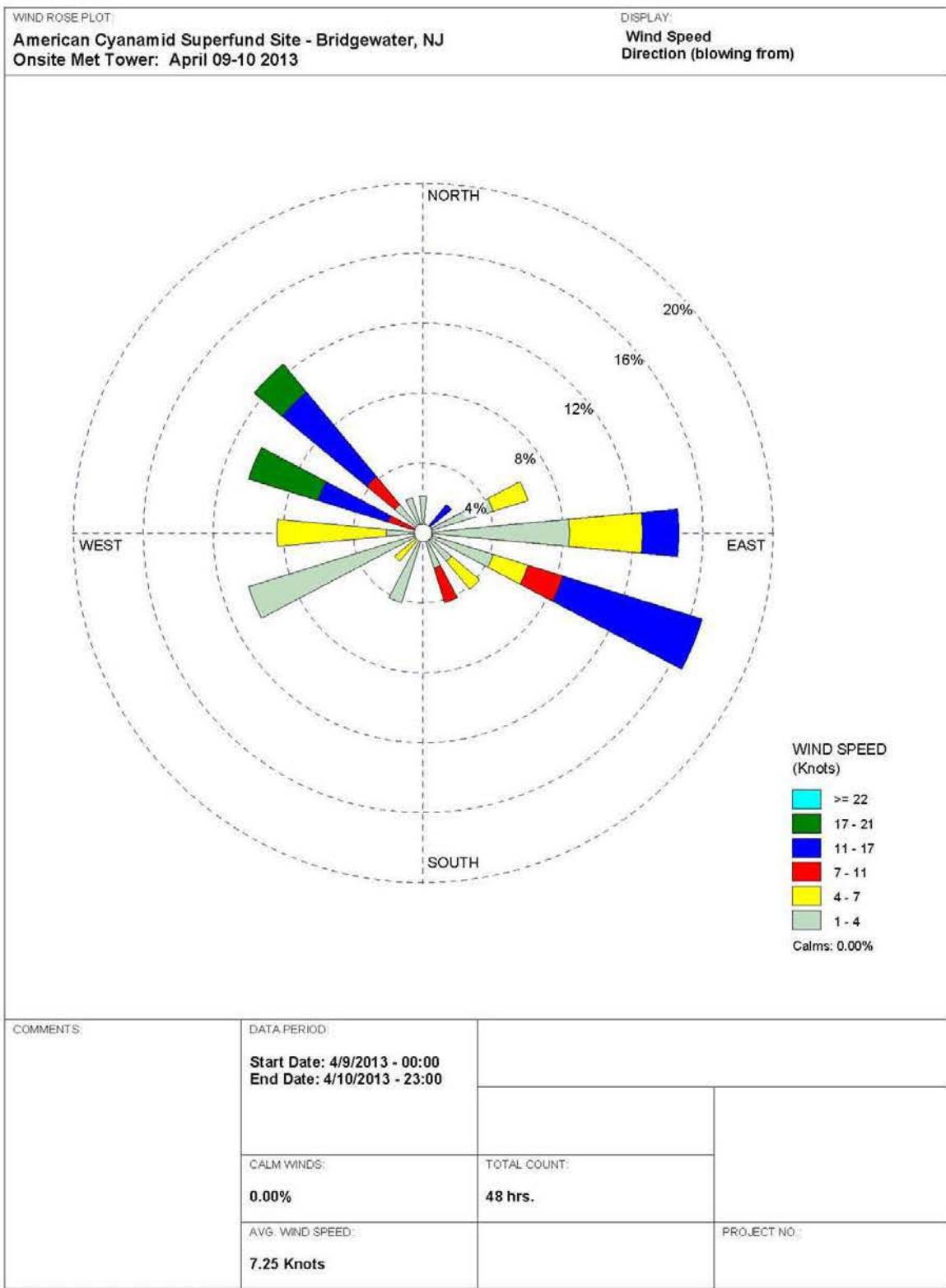


FIGURE 3-3

On-Site Wind Rose for April 9 and 10, 2013

American Cyanamid Site, Bridgewater, New Jersey

1-Year Summary Ambient Air Monitoring Results



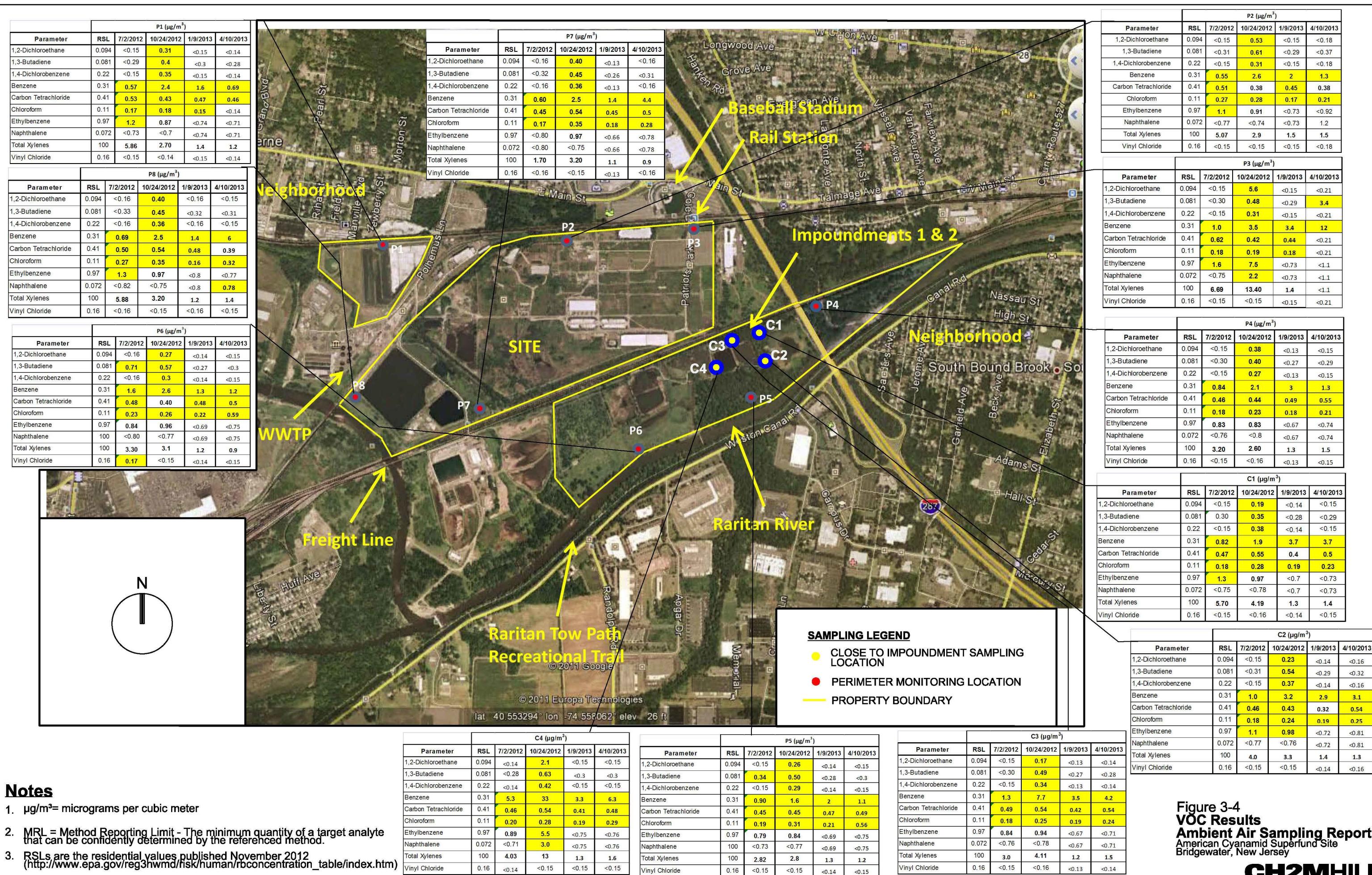


FIGURE 3-5

1,3-Butadiene Ambient Air Concentrations at the Perimeter of the American Cyanamid Site Bridgewater, NJ

Summary of Ambient Air Monitoring Results - July 2012 to April 2013

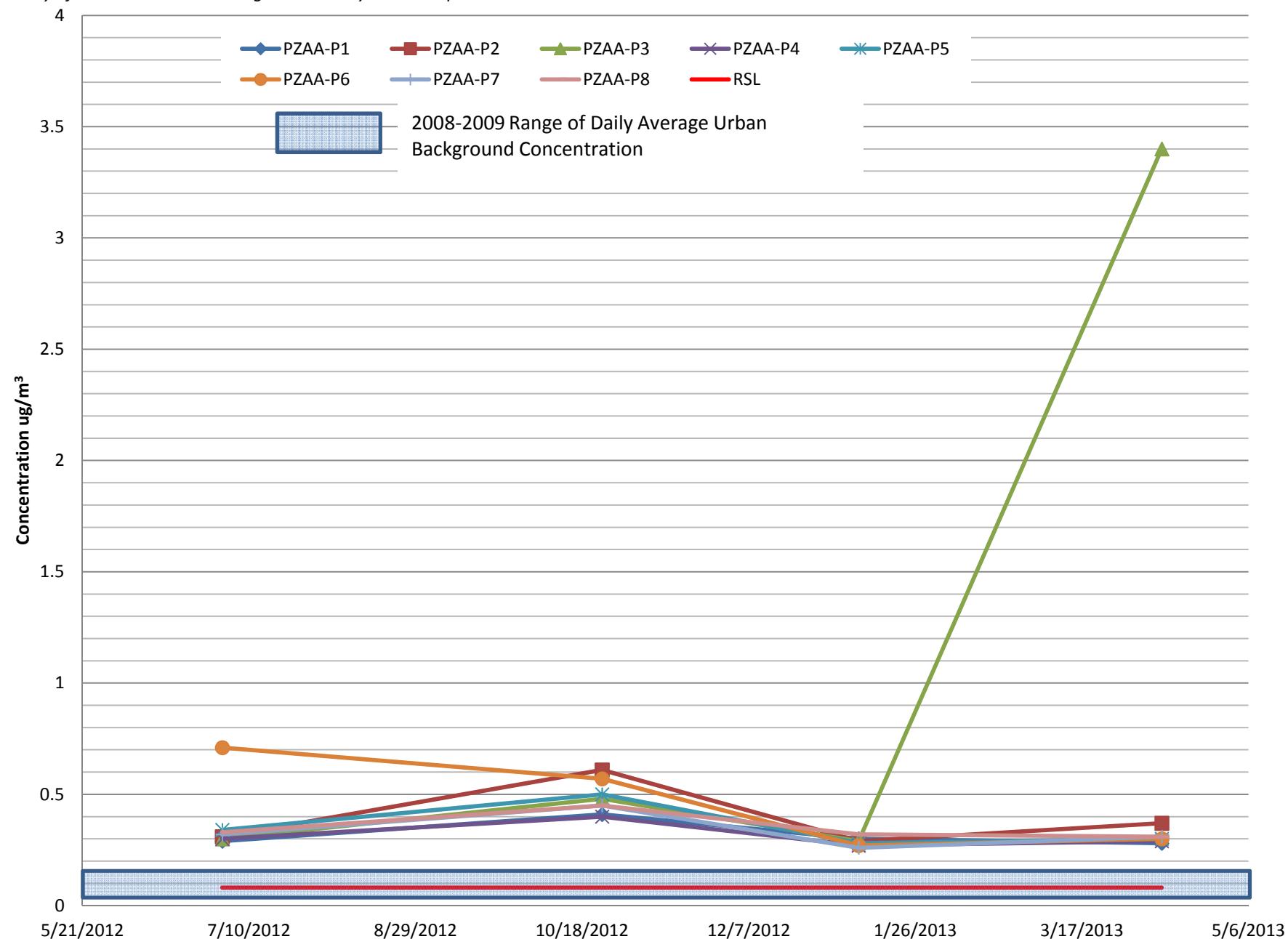


FIGURE 3-6

1,4-Dichlorobenzene Ambient Air Concentrations at the Perimeter of the American Cyanamid Site Bridgewater, NJ

Summary of Ambient Air Monitoring Results - July 2012 to April 2013

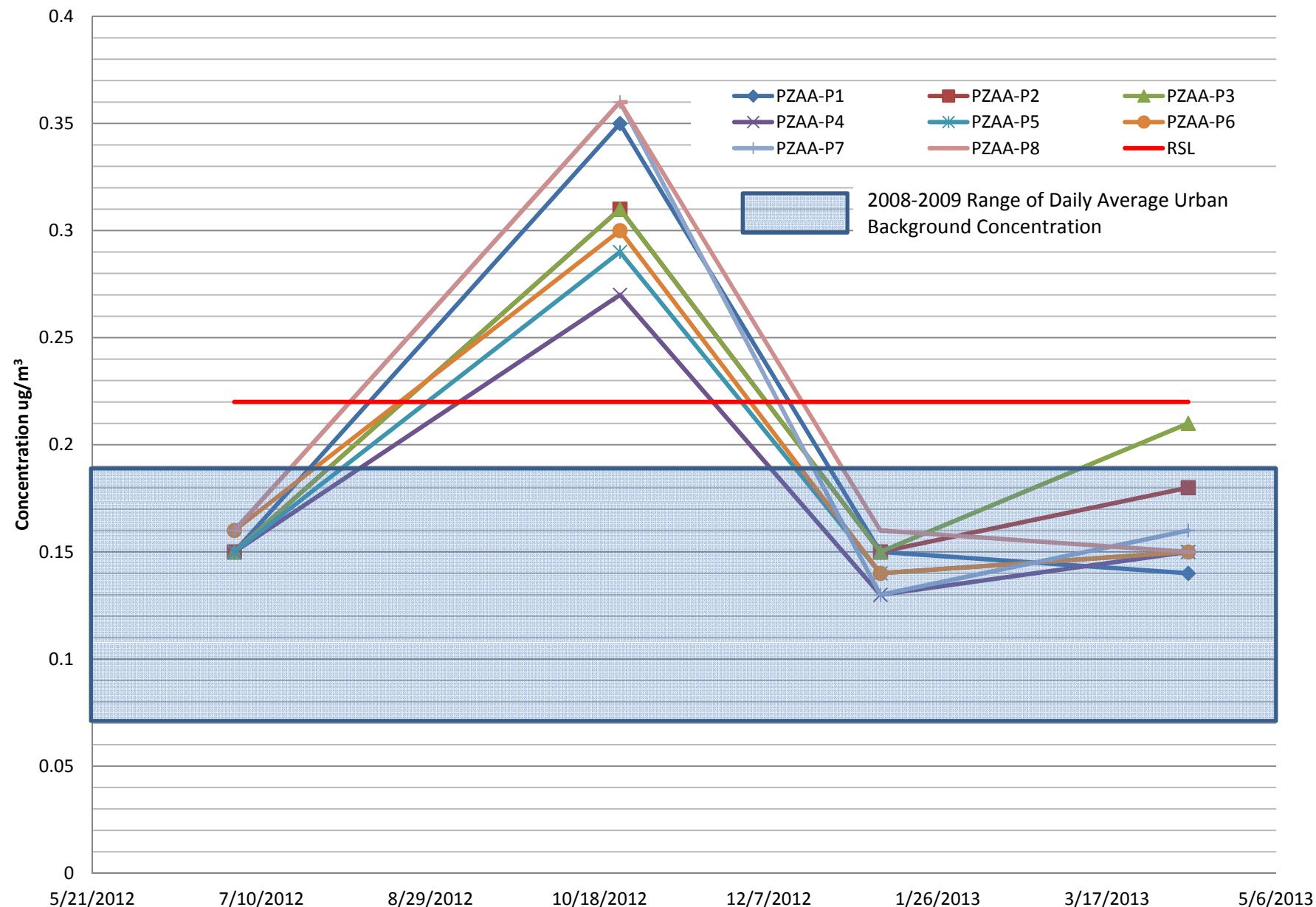


FIGURE 3-7

Benzene Ambient Air Concentrations at the Perimeter of the American Cyanamid Site Bridgewater, NJ

Summary of Ambient Air Monitoring Results - July 2012 to April 2013

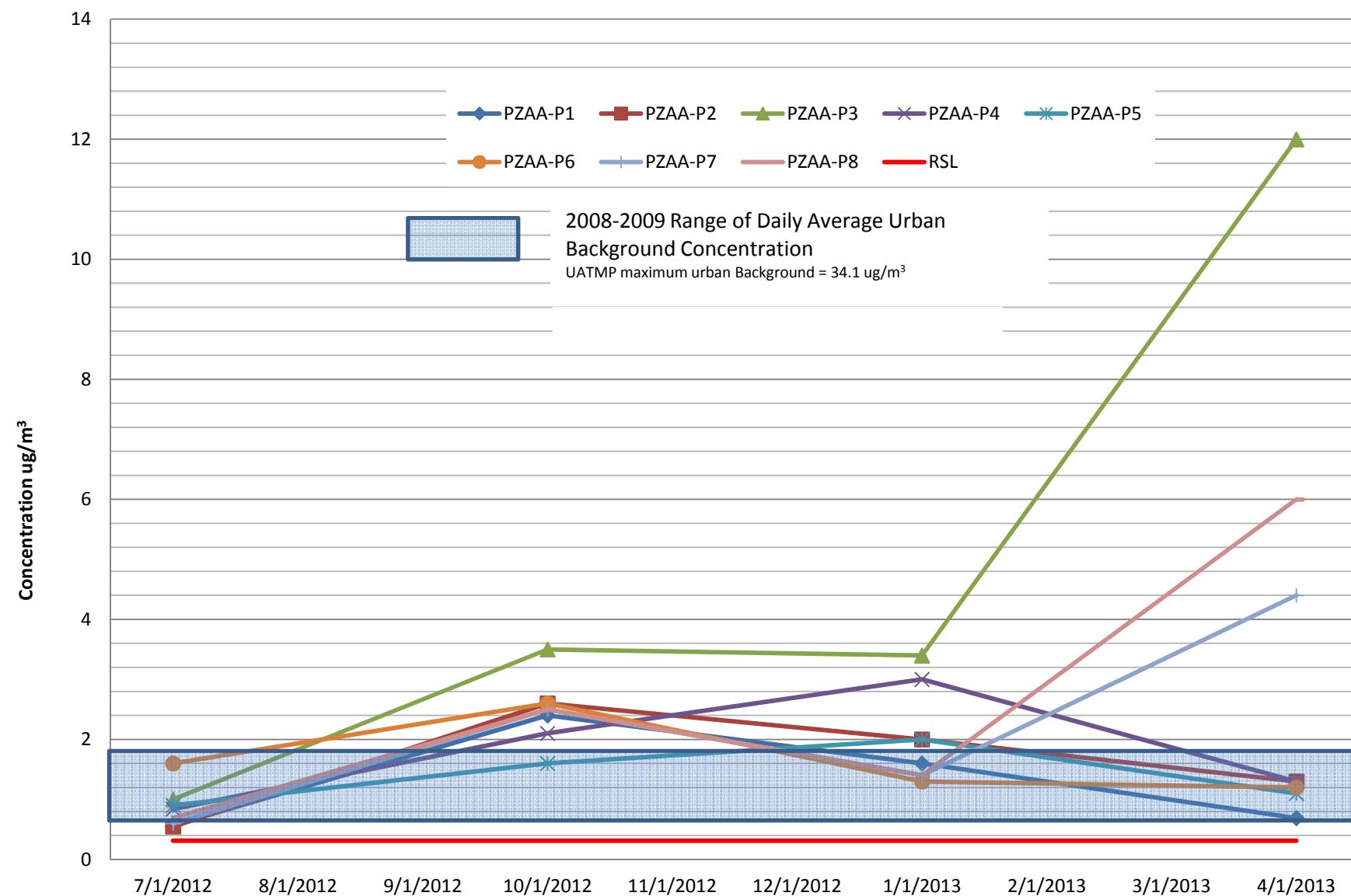


FIGURE 3-8

Carbon Tetrachloride Ambient Air Concentrations at the Perimeter of the American Cyanamid Site Bridgewater, NJ

Summary of Ambient Air Monitoring Results - July 2012 to April 2013

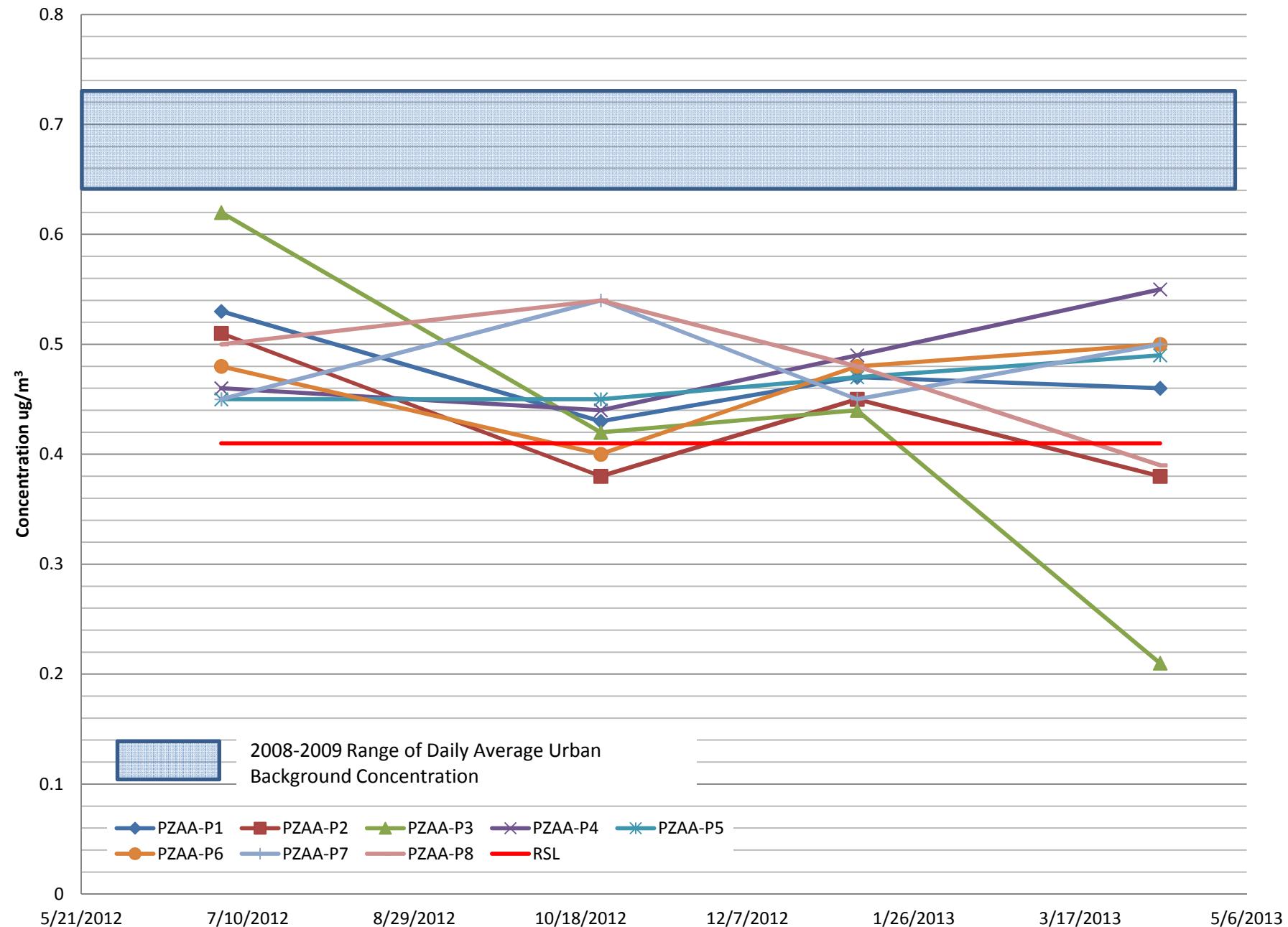


FIGURE 3-9

Chloroform Ambient Air Concentrations at the Perimeter of the American Cyanamid Site Bridgewater, NJ

Summary of Ambient Air Monitoring Results - July 2012 to April 2013

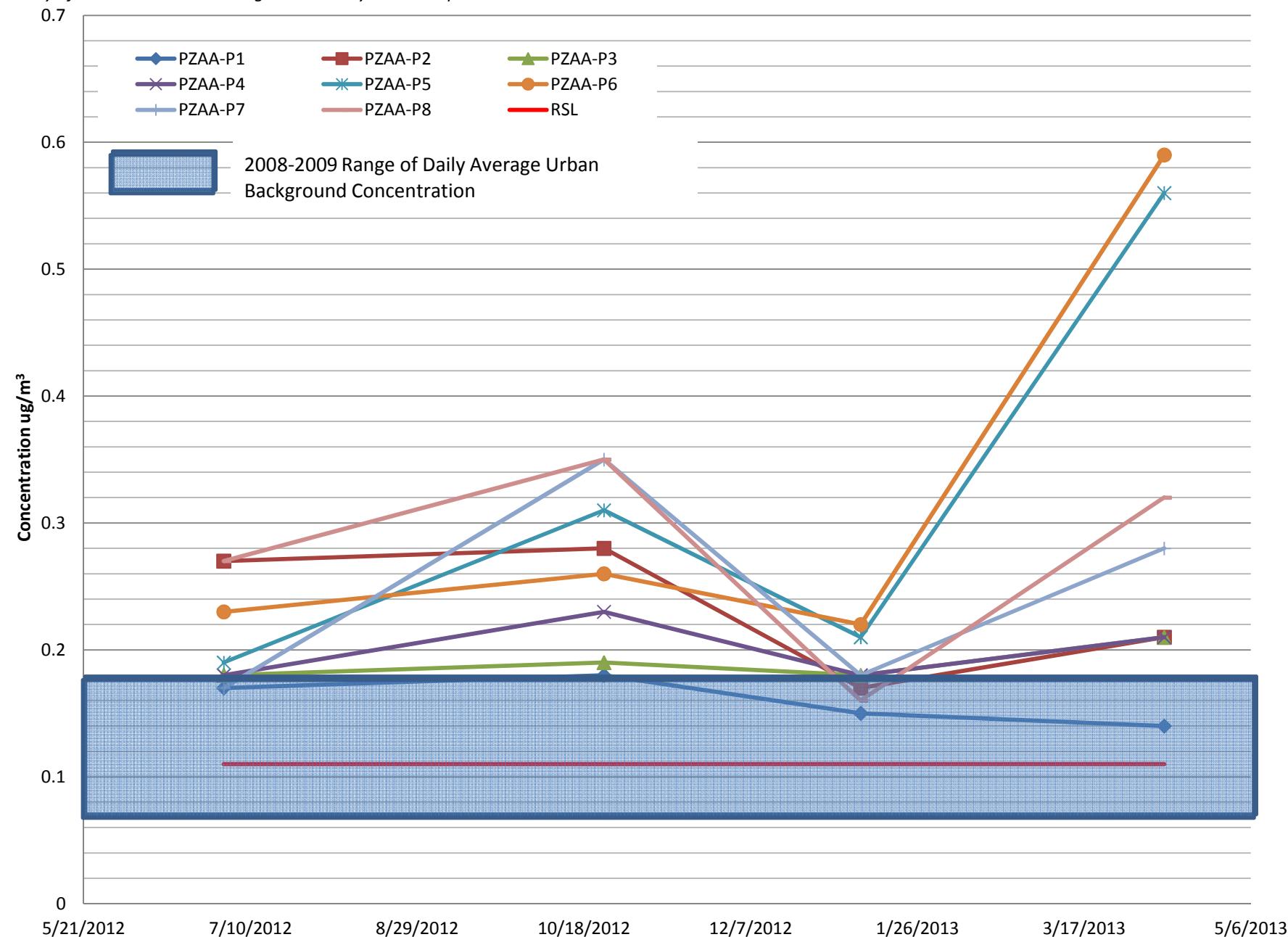


FIGURE 3-10

Ethylbenzene Ambient Air Concentrations at the Perimeter of the American Cyanamid Site Bridgewater, NJ

Summary of Ambient Air Monitoring Results- July 2012 to April 2013

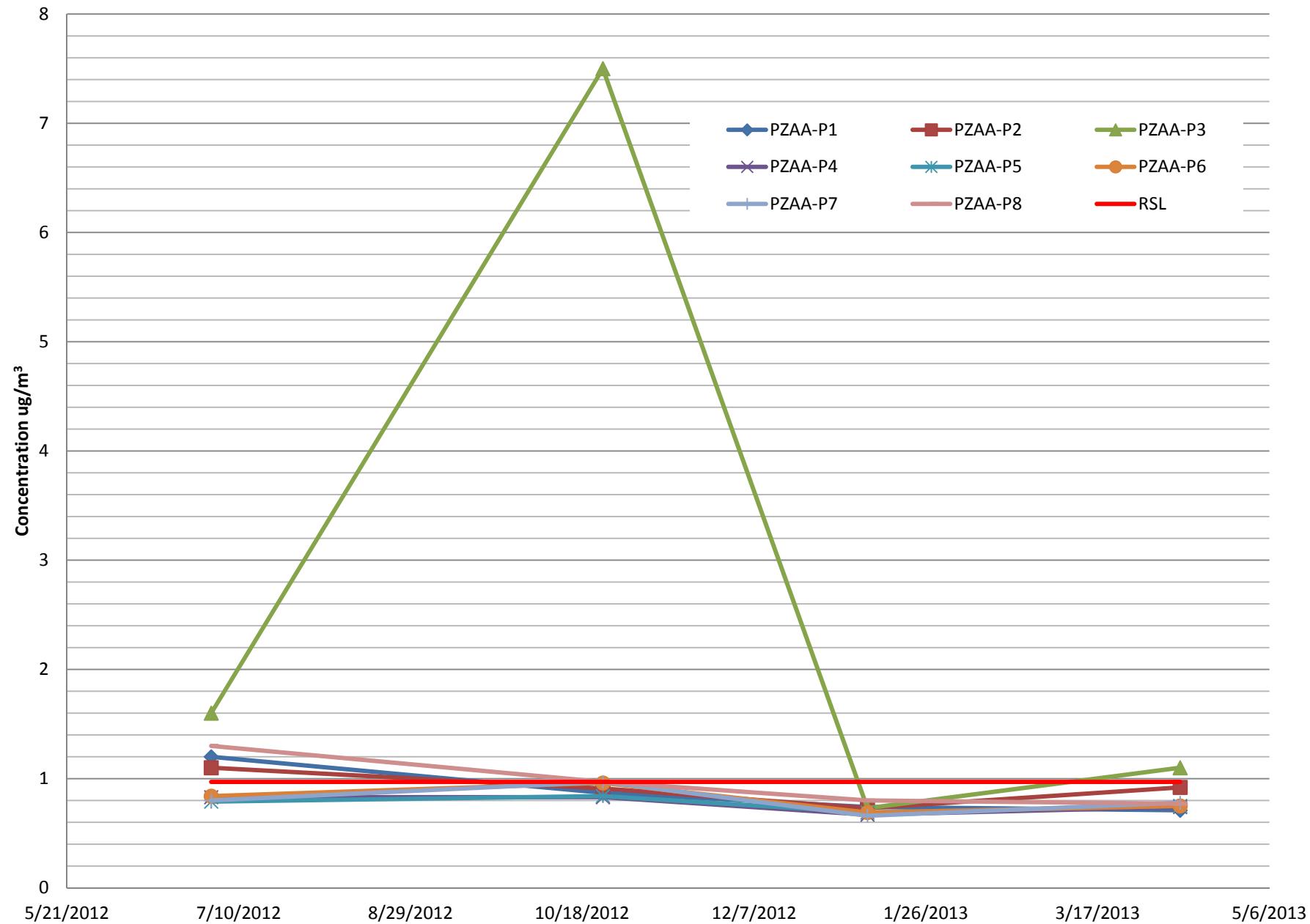


FIGURE 3-11

Benzene Ambient Air Concentrations at Impoundments 1 and 2 of the American Cyanamid Site Bridgewater, NJ

Summary of Ambient Air Monitoring Results- July 2012 to April 2013



FIGURE 3-12

Carbon Tetrachloride Ambient Air Concentrations at Impoundments 1 and 2 of the American Cyanamid Site Bridgewater, NJ

Summary of Ambient Air Monitoring Results- July 2012 to April 2013

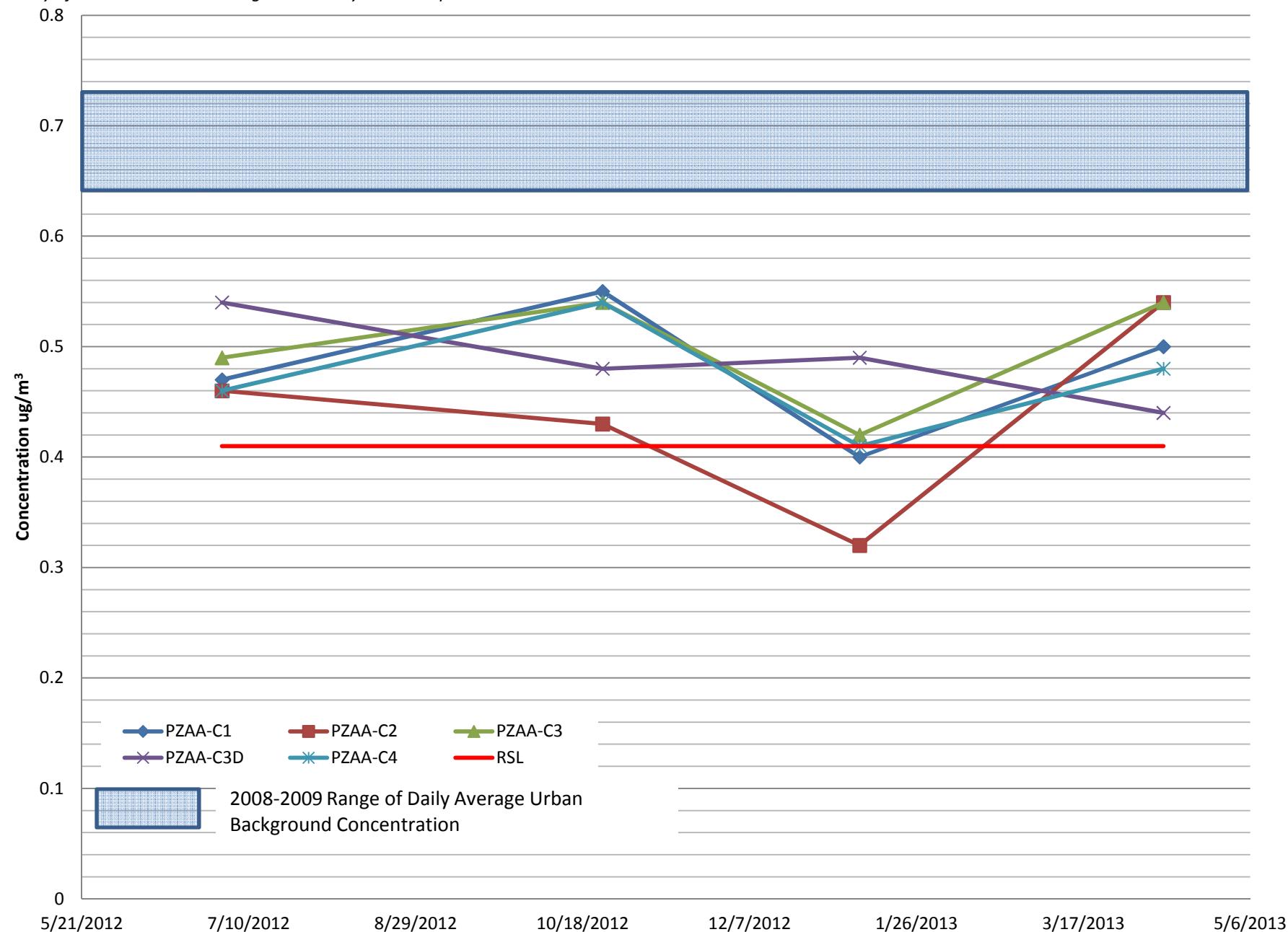


FIGURE 3-13

Chloroform Ambient Air Concentrations at Impoundments 1 and 2 of the American Cyanamid Site Bridgewater, NJ

Summary of Ambient Air Monitoring Results- July 2012 to April 2013

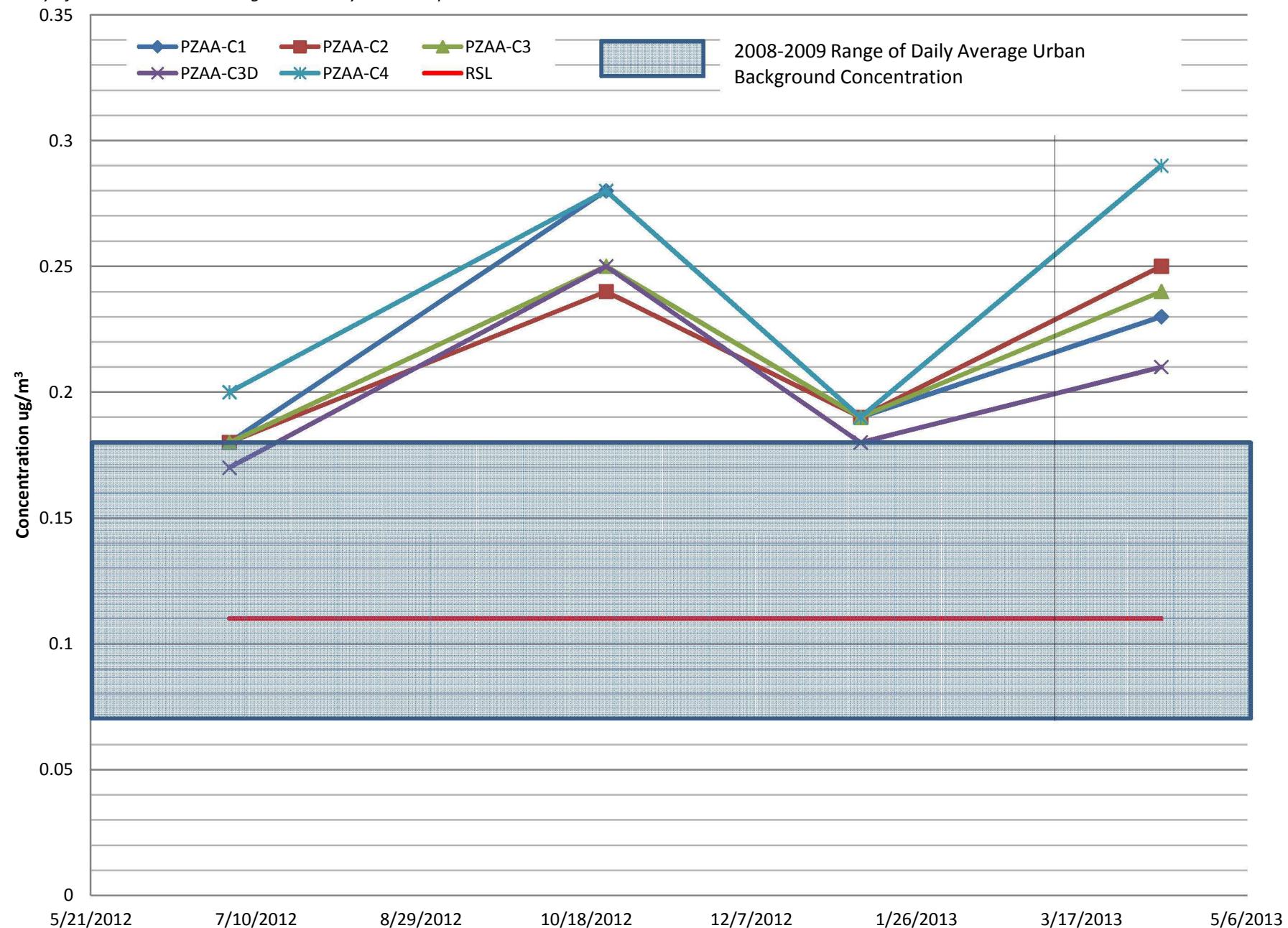
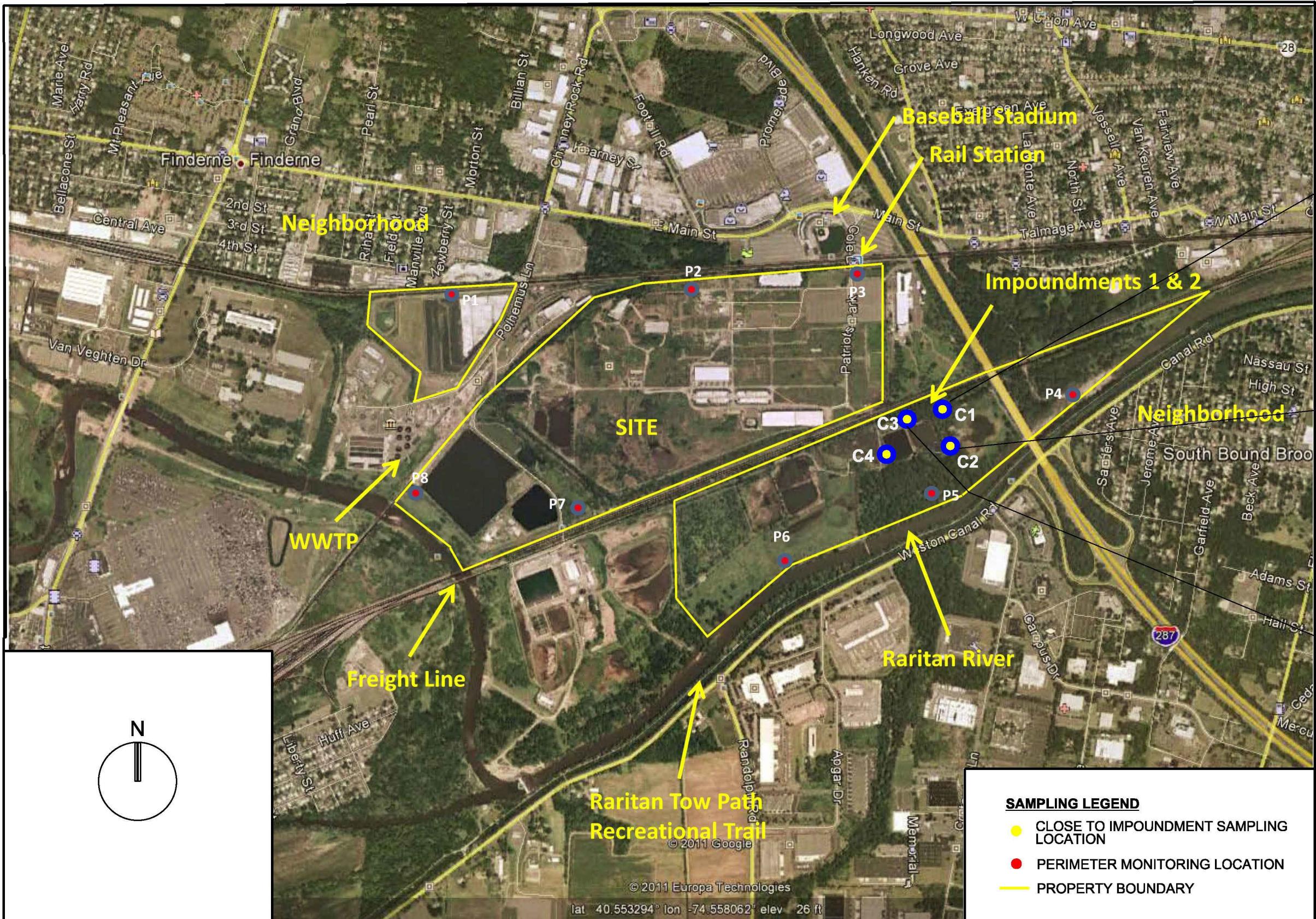


FIGURE 3-14

Ethylenzene Ambient Air Concentrations at Impoundments 1 and 2 of the American Cyanamid Site Bridgewater, NJ

Summary of Ambient Air Monitoring Results - July 2012 to April 2013





Notes

1. $\mu\text{g}/\text{m}^3$ = micrograms per cubic meter
2. MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.
3. RSLs are the residential values published May 2012 (http://www.epa.gov/reg3hwmd/fisk/human/rbconcentration_table/index.htm)

Figure 3-15
Aldehyde Results above RSLs
Ambient Air Sampling Report
American Cyanamid Superfund Site
Bridgewater, New Jersey

CH2MHILL

FIGURE 3-16

Acetaldehyde Ambient Air Concentrations at Impoundments 1 and 2 of the American Cyanamid Site Bridgewater, NJ

Summary of Ambient Air Monitoring Results- July 2012 to April 2013

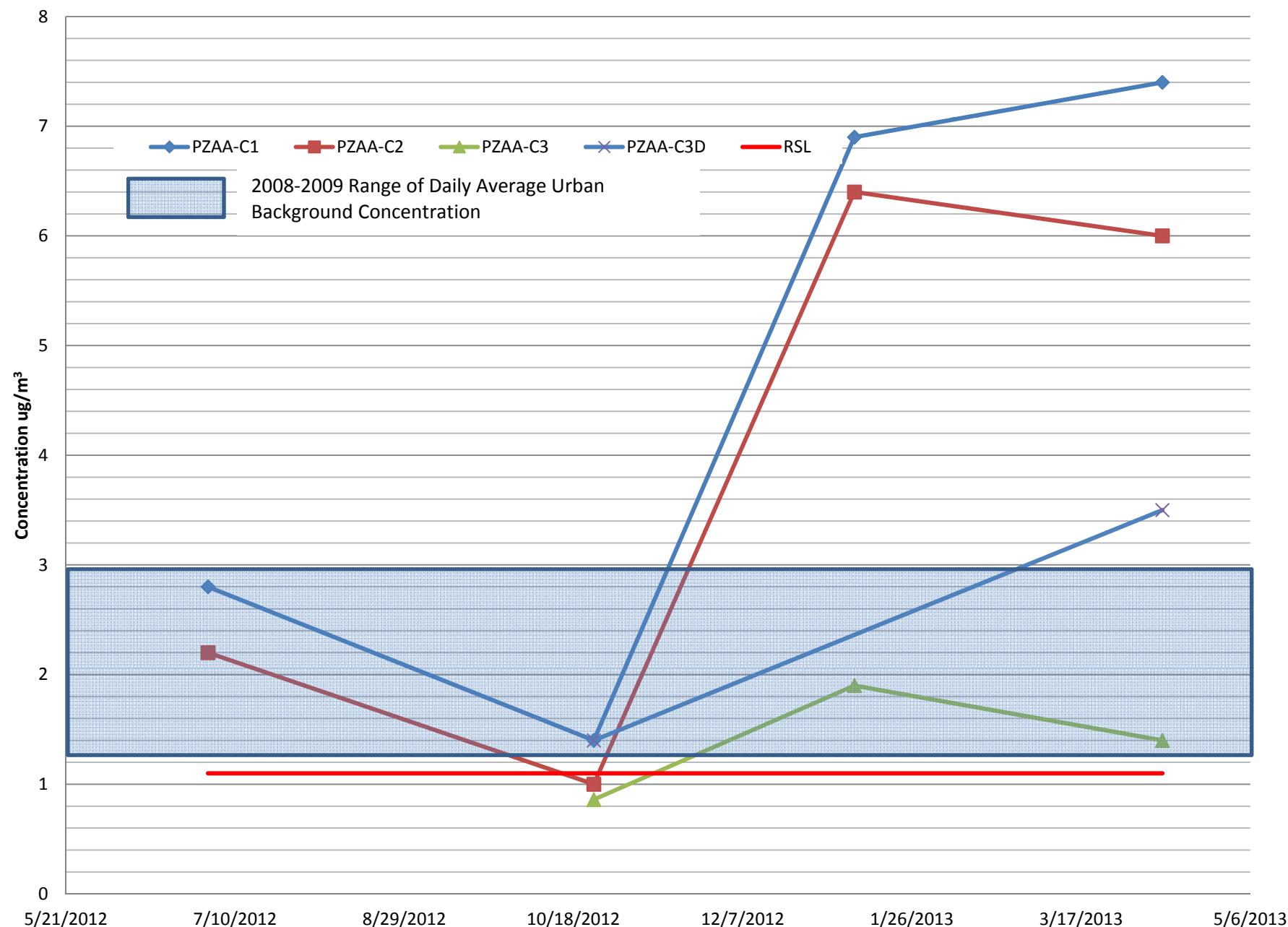


FIGURE 3-17

Formaldehyde Ambient Air Concentrations at Impoundments 1 and 2 of the American Cyanamid Site Bridgewater, NJ

Summary of Ambient Air Monitoring Results - July 2013 to April 2013

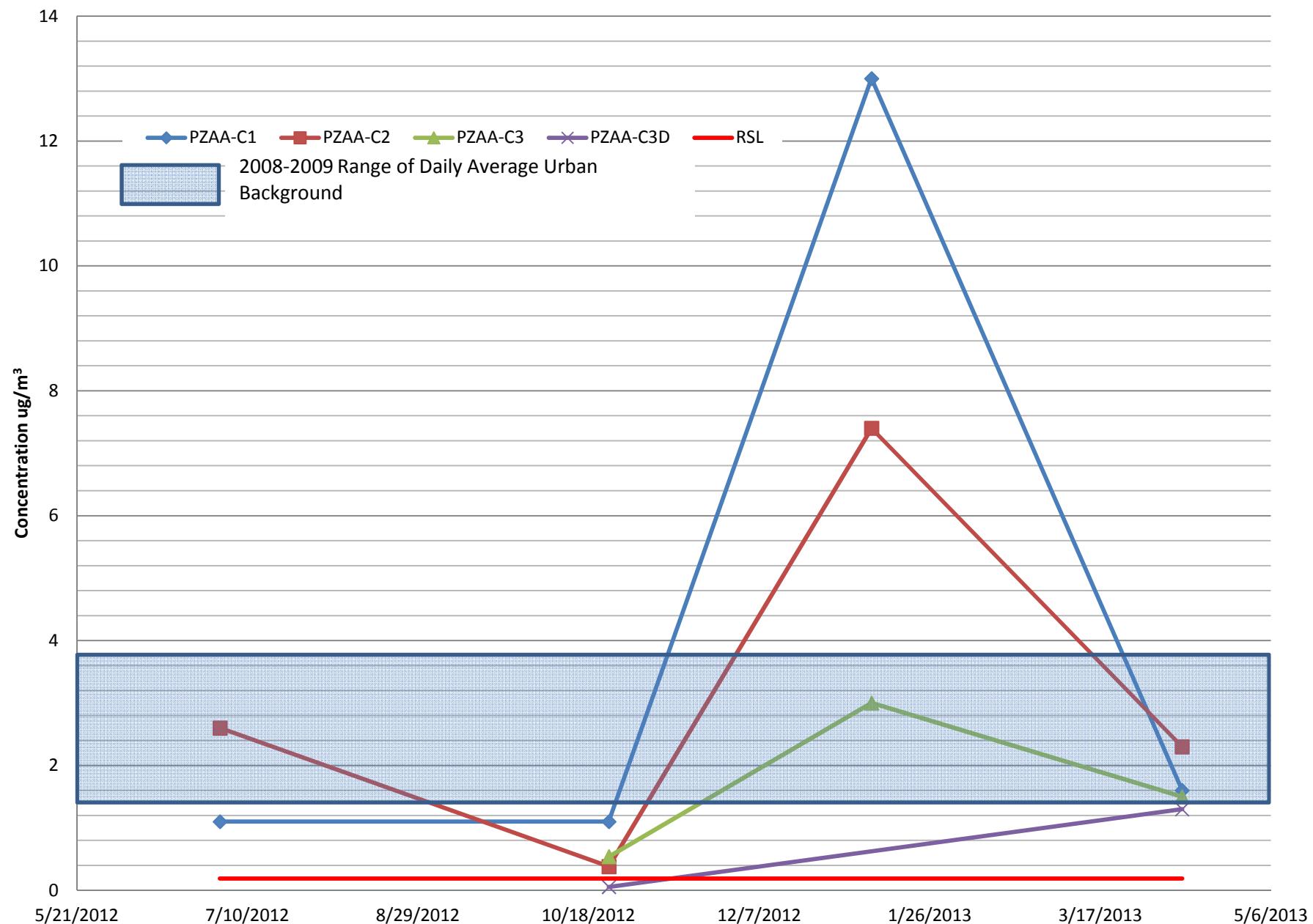


FIGURE 3-18

Naphthalene Ambient Air Concentrations at the Perimeter of the American Cyanamid Site Bridgewater, NJ

Summary of Ambient Air Monitoring Results - July 2012 to April 2013



Appendix A
Ambient Air Monitoring Data – July 2012 through
April 2013

Appendix C-1

Volatile Organic Compounds (VOCs) Analyzed Using EPA Method TO-15

July 2012, October 2012, January 2013, and April 2013 Ambient Air Monitoring Events

Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgewater, New Jersey

CAS#	Parameter	Sample Location Field Sample ID	PZAA-P1								PZAA-P2	
			PZAA-P1-072012	PZAA-P1-102412	PZAA-P1-010913	PZAA-P1-041013					PZAA-P2-072012	
71-55-6	1,1,1-Trichloroethane	5,200	0.15	U	0.14	U	0.15	U	0.14	U	0.15	U
79-34-5	1,1,2,2-Tetrachloroethane	0.042	0.15	U	0.14	U	0.15	U	0.14	U	0.15	U
79-00-5	1,1,2-Trichloroethane	0.15	0.15	U	0.14	U	0.15	U	0.14	U	0.15	U
75-34-3	1,1-Dichloroethane	1.5	0.15	U	0.14	U	0.15	U	0.14	U	0.15	U
75-35-4	1,1-Dichloroethene	210	0.15	U	0.14	U	0.15	U	0.14	U	0.15	U
120-82-1	1,2,4-Trichlorobenzene	2.1	0.73	U	0.70	U	0.74	U	0.71	U	0.77	U
95-63-6	1,2,4-Trimethylbenzene	7.3	1.0	=	0.70	U	0.74	U	0.71	U	0.86	=
96-12-8	1,2-Dibromo-3-chloropropane	-	0.73	U	0.70	U	0.74	U	0.71	UJ	0.77	U
106-93-4	1,2-Dibromoethane	0.0041	0.15	U	0.14	U	0.15	U	0.14		0.15	U
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	-	0.73	U	0.70	U	0.74	U	0.71	U	0.77	U
95-50-1	1,2-Dichlorobenzene	210	0.15	U	0.14	U	0.15	U	0.14	U	0.15	U
107-06-2	1,2-Dichloroethane	0.094	0.15	U	0.31	=	0.15	U	0.14	U	0.15	U
78-87-5	1,2-Dichloropropane	0.24	0.15	U	0.14	U	0.15	U	0.14	U	0.15	U
108-67-8	1,3,5-Trimethylbenzene	7.3	0.73	U	0.70	U	0.74	U	0.71	U	0.77	U
106-99-0	1,3-Butadiene	0.081	0.29	U	0.4	=	0.3	U	0.28	U	0.31	U
541-73-1	1,3-Dichlorobenzene	210	0.15	U	0.14	U	0.15	U	0.14	U	0.15	U
106-46-7	1,4-Dichlorobenzene	0.22	0.15	U	0.35	=	0.15	U	0.14	U	0.15	U
123-91-1	1,4-Dioxane	0.32	0.73	U	0.70	U	0.74	U	0.71	U	0.77	U
78-93-3	2-Butanone (MEK)	5,200	7.3	U	12	=	7.4	U	7.1	U	7.7	U
591-78-6	2-Hexanone	31	0.88	=	1.4	=	0.74	U	0.71	U	0.77	U
67-63-0	2-Propanol (Isopropyl Alcohol)	-	7.3	U	12	=	7.4	U	7.1	U	7.7	U
107-05-1	3-Chloro-1-propene (Allyl Chloride)	-	0.15	U	0.14	U	0.15	U	0.14	U	0.15	U
622-96-8	4-Ethyltoluene	-	0.73	U	0.70	U	0.74	U	0.71	U	0.77	U
108-10-1	4-Methyl-2-pentanone	3,100	0.73	U	0.70	U	0.74	U	0.71	U	0.77	U
67-64-1	Acetone	32,000	19	=	170	=	16	=	12	=	11	=
75-05-8	Acetonitrile	-	0.73	U	0.82	=	0.74	U	0.71	U	0.77	U
107-02-8	Acrolein	-	2.9	U	6.2	=	3	U	2.8	U	3.1	U
107-13-1	Acrylonitrile	-	0.73	U	0.70	U	0.74	U	0.71	U	0.77	U
80-56-8	alpha-Pinene	-	0.73	U	1.6	=	1.5	=	1.4	=	0.77	U
71-43-2	Benzene	0.31	0.57	=	2.4	=	1.6	=	0.69	=	0.55	=
100-44-7	Benzyl Chloride	0.05	0.73	U	0.70	U	0.74	U	0.71	UJ	0.77	U
75-27-4	Bromodichloromethane	42	0.15	U	0.14	U	0.15	U	0.14	U	0.15	U
75-25-2	Bromoform	2.2	0.73	U	0.70	U	0.74	U	0.71	U	0.77	U
74-83-9	Bromomethane	5.2	0.15	U	0.14	U	0.15	U	0.14	U	0.15	U
75-15-0	Carbon Disulfide	730	7.3	U	7.0	U	7.4	U	7.1	U	7.7	U
56-23-5	Carbon Tetrachloride	0.41	0.53	=	0.43	=	0.47	=	0.46	=	0.51	=
108-90-7	Chlorobenzene	52	0.15	U	0.14	U	0.15	U	0.14	U	0.15	U
75-00-3	Chloroethane	10,000	0.15	U	0.14	U	0.15	U	0.14	U	0.15	U
67-66-3	Chloroform	0.11	0.17	=	0.18	=	0.15	=	0.14	U	0.27	=
74-87-3	Chloromethane	94	0.40	=	0.52	=	0.61	=	0.45	=	0.43	=
156-59-2	cis-1,2-Dichloroethene	63	0.15	U	0.14	U	0.15	U	0.14	U	0.15	U
10061-01-5	cis-1,3-Dichloropropene	0.61	0.73	U	0.70	U	0.74	U	0.71	U	0.77	U
98-82-8	Cumene	1,000	0.73	U	0.70	U	0.74	U	0.71	U	0.77	U
110-82-7	Cyclohexane	6,300	1.5	U	1.4	U	1.5	U	1.4	U	1.5	U
124-48-1	Dibromochloromethane	0.09	0.15	U	0.14	U	0.15	U	0.14	U	0.15	U
75-71-8	Dichlorodifluoromethane (CFC 12)	100	2.3	=	2.0	=	2.2	=	2	=	2.5	=
5989-27-5	d-Limonene	-	0.73	U	1.2	=	0.74	U	0.71	U	0.77	U
64-17-5	Ethanol	-	20	=	45	=	10	=	9.3	=	13	=
141-78-6	Ethyl Acetate	-	2.6	=	4.2	=	1.5	U	1.8	=	4.2	=
100-41-4	Ethylbenzene	0.97	1.2	=	0.87	=	0.74	U	0.71	U	1.1	=
87-68-3	Hexachlorobutadiene	0.11	0.73	U	0.70	U	0.74	U	0.71	U	0.77	U
179601-23-1	m,p-Xylenes	100	5.0	=	2.7	=	1.4	=	1.2	=	4.3	=
80-62-6	Methyl Methacrylate	-	1.5	U	1.4	U	1.5	U	1.4	U	1.5	U
1634-04-4	Methyl tert-Butyl Ether	9.4	0.15	U	0.14	U	0.15	U	0.14	U	0.15	U
75-09-2	Methylene Chloride	96	0.74	=	2.0	=	0.97	=	0.71	U	0.91	=
91-20-3	Naphthalene	0.072	0.73	U	0.70	U	0.74	U	0.71	U	0.77	U
123-86-4	n-Butyl Acetate	-	0.92	=	0.70	U	0.74	U	0.71	U	0.77	U
142-82-5	n-Heptane	-	0.73	U	1.4	=	0.74	U	0.71	U	0.77	U
110-54-3	n-Hexane	730	0.78	=	1.8	=	1.1	=	0.71	U	0.77	U
111-84-2	n-Nonane	-	0.73	U	0.70	U	0.74	U	0.71	U	0.77	U
111-65-9	n-Octane	-	0.73	U	1.0	=	0.74</					

Appendix C-1
 Volatile Organic Compounds (VOCs) Analyzed Using EPA Method TC
 July 2012, October 2012, January 2013, and April 2013 Ambient Air I
 Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgeview

CAS#	Parameter	Field Sample ID	Sample Location						PZAA-P3		
			PZAA-P2-102412	PZAA-P2-010913	PZAA-P2-041013	PZAA-P3-072012	PZAA-P3-102412	PZAA-P3-010913			
71-55-6	1,1,1-Trichloroethane	5,200	0.15	U	0.15	U	0.18	U	0.15	U	0.15
79-34-5	1,1,2,2-Tetrachloroethane	0.042	0.15	U	0.15	U	0.18	U	0.15	U	0.15
79-00-5	1,1,2-Trichloroethane	0.15	0.15	U	0.15	U	0.18	U	0.15	U	0.15
75-34-3	1,1-Dichloroethane	1.5	0.15	U	0.15	U	0.18	U	0.15	U	0.15
75-35-4	1,1-Dichloroethene	210	0.15	U	0.15	U	0.18	U	0.15	U	0.15
120-82-1	1,2,4-Trichlorobenzene	2.1	0.74	U	0.73	U	0.92	U	0.75	U	0.73
95-63-6	1,2,4-Trimethylbenzene	7.3	0.74	U	0.73	U	0.92	U	1.2	=	2.2
96-12-8	1,2-Dibromo-3-chloropropane	-	0.74	U	0.73	U	0.92	UJ	0.75	U	0.73
106-93-4	1,2-Dibromoethane	0.0041	0.15	U	0.15	U	0.18	U	0.15	U	0.15
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	-	0.74	U	0.73	U	0.92	U	0.75	U	0.73
95-50-1	1,2-Dichlorobenzene	210	0.15	U	0.15	U	0.18	U	0.15	U	0.22
107-06-2	1,2-Dichloroethane	0.094	0.53	=	0.15	U	0.18	U	0.15	U	0.15
78-87-5	1,2-Dichloropropane	0.24	0.15	U	0.15	U	0.18	U	0.15	U	0.15
108-67-8	1,3,5-Trimethylbenzene	7.3	0.74	U	0.73	U	0.92	U	0.75	U	0.73
106-99-0	1,3-Butadiene	0.081	0.61	=	0.29	U	0.37	U	0.30	U	0.48
541-73-1	1,3-Dichlorobenzene	210	0.15	U	0.15	U	0.18	U	0.15	U	0.15
106-46-7	1,4-Dichlorobenzene	0.22	0.31	=	0.15	U	0.18	U	0.15	U	0.31
123-91-1	1,4-Dioxane	0.32	0.74	U	0.73	U	0.92	U	0.75	U	0.73
78-93-3	2-Butanone (MEK)	5,200	21	=	7.3	U	9.2	U	12	=	26
591-78-6	2-Hexanone	31	1.9	=	0.73	U	0.92	U	12	=	0.75
67-63-0	2-Propanol (Isopropyl Alcohol)	-	74	=	7.3	U	9.2	U	82	=	15
107-05-1	3-Chloro-1-propene (Allyl Chloride)	-	0.15	U	0.15	U	0.18	U	0.15	U	0.15
622-96-8	4-Ethyltoluene	-	0.74	U	0.73	U	0.92	U	0.75	U	0.73
108-10-1	4-Methyl-2-pentanone	3,100	0.74	U	0.73	U	0.92	U	2.5	=	3.4
67-64-1	Acetone	32,000	330	=	13	=	17	=	29	=	210
75-05-8	Acetonitrile	-	1.3	=	0.73	U	0.92	U	0.84	=	0.98
107-02-8	Acrolein	-	13	=	2.9	U	3.7	U	3.0	U	9.3
107-13-1	Acrylonitrile	-	0.74	U	0.73	U	0.92	U	0.75	U	0.73
80-56-8	alpha-Pinene	-	2.0	=	2.4	=	5.6	=	0.75	U	5.0
71-43-2	Benzene	0.31	2.6	=	2	=	1.3	=	1.0	=	3.4
100-44-7	Benzyl Chloride	0.05	0.74	U	0.73	U	0.92	UJ	0.75	U	0.73
75-27-4	Bromodichloromethane	42	0.15	U	0.15	U	0.18	U	0.15	U	0.15
75-25-2	Bromoform	2.2	0.74	U	0.73	U	0.92	U	0.75	U	0.73
74-83-9	Bromomethane	5.2	0.15	U	0.15	U	0.18	U	0.15	U	0.15
75-15-0	Carbon Disulfide	730	7.4	U	7.3	U	9.2	U	7.5	U	9.1
56-23-5	Carbon Tetrachloride	0.41	0.38	=	0.45	=	0.38	=	0.62	=	0.44
108-90-7	Chlorobenzene	52	0.15	U	0.37	=	0.22	=	0.15	U	0.76
75-00-3	Chloroethane	10,000	0.15	U	0.15	U	0.18	U	0.15	U	0.15
67-66-3	Chloroform	0.11	0.28	=	0.17	=	0.21	=	0.18	=	0.19
74-87-3	Chloromethane	94	0.67	=	0.53	=	0.55	=	0.39	=	0.59
156-59-2	cis-1,2-Dichloroethene	63	0.15	U	0.15	U	0.18	U	0.15	U	0.15
10061-01-5	cis-1,3-Dichloropropene	0.61	0.74	U	0.73	U	0.92	U	0.75	U	0.73
98-82-8	Cumene	1,000	0.74	U	0.73	U	0.92	U	0.75	U	6.4
110-82-7	Cyclohexane	6,300	1.5	U	1.5	U	1.8	U	1.5	U	1.5
124-48-1	Dibromochloromethane	0.09	0.15	U	0.15	U	0.18	U	0.15	U	0.15
75-71-8	Dichlorodifluoromethane (CFC 12)	100	2.1	=	2.1	=	2.2	=	2.2	=	2.1
5989-27-5	d-Limonene	-	1.4	=	0.95	=	0.92	U	0.75	U	5.0
64-17-5	Ethanol	-	59	=	7.3	=	14	=	470	=	7.3
141-78-6	Ethyl Acetate	-	4.9	=	1.5	U	2.9	=	37	=	6.1
100-41-4	Ethylbenzene	0.97	0.91	=	0.73	U	0.92	U	1.6	=	7.5
87-68-3	Hexachlorobutadiene	0.11	0.74	U	0.73	U	0.92	U	0.75	U	0.73
179601-23-1	m,p-Xylenes	100	2.9	=	1.5	=	1.5	=	5.7	=	6.0
80-62-6	Methyl Methacrylate	-	1.5	U	1.5	U	1.8	U	1.5	U	1.5
1634-04-4	Methyl tert-Butyl Ether	9.4	0.15	U	0.15	U	0.18	U	0.15	U	0.66
75-09-2	Methylene Chloride	96	2.3	=	0.89	=	0.95	=	1.3	=	5.2
91-20-3	Naphthalene	0.072	0.74	U	0.73	U	1.2	=	0.75	U	2.2
123-86-4	n-Butyl Acetate	-	0.74	=	0.73	U	0.92	U	0.76	=	1.3
142-82-5	n-Heptane	-	1.6	=	0.73	U	0.92	U	0.75	U	5.1
110-54-3	n-Hexane	730	1.8	=	1.1	=	0.92	U	0.90	=	11
111-84-2	n-Nonane	-	0.74	U	0.73	U	0.92	U	0.75	U	7.2
111-65-9	n-Octane	-	1.0	=	0.73	U	0.92	U	0.75	U	5.9
103-65-1	n-Propylbenzene	1,000	0.74	U	0.73	U	0.92	U	0.75	U	0.73
95-47-6	o-Xylene	100	0.74	U	0.73	U	0.92	U	0.99	=	7.4
	Total Xylenes	100	2.9		1.5		1.5		6.69		13.40
115-07-1	Propene	-	15	=	1.6	=	1.4	=	21	=	6.0
100-42-5	Styrene	1,000	0.74	U	0.73	U	0.92	U	0.75	U	20
127-18-4	Tetrachloroethene	9.4	0.19	=	0.21	=	0.18	U	0.19	=	0.81
109-99-9	Tetrahydrofuran (THF)	-	0.74	U	0.73	U	0.92	U	0.75	U	7.5
108-88-3	Toluene	3,100	5.5</								

Appendix C-1
 Volatile Organic Compounds (VOCs) Analyzed Using EPA Method TC
*July 2012, October 2012, January 2013, and April 2013 Ambient Air at
 Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgeview*

CAS#	Parameter	Sample Location		PZAA-P4					
		Field Sample ID	PZAA-P3-041013	PZAA-P4-072012	PZAA-P4-102412	PZAA-P4-010913	PZAA-P4-041013		
71-55-6	1,1,1-Trichloroethane	5,200	U	0.21	U	0.15	U	0.16	U
79-34-5	1,1,2,2-Tetrachloroethane	0.042	U	0.21	U	0.15	U	0.16	U
79-00-5	1,1,2-Trichloroethane	0.15	U	0.21	U	0.15	U	0.16	U
75-34-3	1,1-Dichloroethane	1.5	U	0.21	U	0.15	U	0.16	U
75-35-4	1,1-Dichloroethene	210	U	0.21	U	0.15	U	0.16	U
120-82-1	1,2,4-Trichlorobenzene	2.1	U	1.1	U	0.76	U	0.80	U
95-63-6	1,2,4-Trimethylbenzene	7.3	U	1.1	U	1.3	=	0.80	U
96-12-8	1,2-Dibromo-3-chloropropane	-	U	1.1	UJ	0.76	U	0.80	U
106-93-4	1,2-Dibromoethane	0.0041	U	0.21	U	0.15	U	0.16	U
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	-	U	1.1	U	0.76	U	0.80	U
95-50-1	1,2-Dichlorobenzene	210	=	0.21	U	0.15	U	0.16	U
107-06-2	1,2-Dichloroethane	0.094	U	0.21	U	0.15	U	0.38	=
78-87-5	1,2-Dichloropropane	0.24	U	0.21	U	0.15	U	0.16	U
108-67-8	1,3,5-Trimethylbenzene	7.3	U	1.1	U	0.76	U	0.80	U
106-99-0	1,3-Butadiene	0.081	U	3.4	=	0.30	U	0.40	=
541-73-1	1,3-Dichlorobenzene	210	U	0.21	U	0.62	=	0.16	U
106-46-7	1,4-Dichlorobenzene	0.22	U	0.21	U	0.15	U	0.27	=
123-91-1	1,4-Dioxane	0.32	U	1.1	U	0.76	U	0.80	U
78-93-3	2-Butanone (MEK)	5,200	U	110	=	8.2	=	8.9	=
591-78-6	2-Hexanone	31	U	9.5	=	0.76	U	0.8	=
67-63-0	2-Propanol (Isopropyl Alcohol)	-	U	75	=	7.6	U	13	=
107-05-1	3-Chloro-1-propene (Allyl Chloride)	-	U	0.21	U	0.15	U	0.16	U
622-96-8	4-Ethyltoluene	-	U	1.1	U	0.76	U	0.80	U
108-10-1	4-Methyl-2-pentanone	3,100	U	1.6	=	0.76	U	0.80	U
67-64-1	Acetone	32,000	=	2100	D	130	=	120	=
75-05-8	Acetonitrile	-	U	2	=	0.76	U	1.0	=
107-02-8	Acrolein	-	U	36	=	5.9	=	6.3	=
107-13-1	Acrylonitrile	-	U	1.1	U	0.76	U	0.80	U
80-56-8	alpha-Pinene	-	=	3.8	=	13	=	1.5	=
71-43-2	Benzene	0.31	=	12	=	0.84	=	2.1	=
100-44-7	Benzyl Chloride	0.05	U	1.1	UJ	0.76	U	0.80	U
75-27-4	Bromodichloromethane	42	U	0.21	U	0.15	U	0.16	U
75-25-2	Bromoform	2.2	U	1.1	U	0.76	U	0.80	U
74-83-9	Bromomethane	5.2	U	0.21	U	0.15	U	0.16	U
75-15-0	Carbon Disulfide	730	=	11	U	7.6	U	8.0	U
56-23-5	Carbon Tetrachloride	0.41	=	0.21	U	0.46	=	0.44	=
108-90-7	Chlorobenzene	52	=	0.21	U	0.15	U	0.16	U
75-00-3	Chloroethane	10,000	U	0.21	U	0.15	U	0.16	U
67-66-3	Chloroform	0.11	=	0.21	U	0.18	=	0.23	=
74-87-3	Chloromethane	94	=	0.46	=	0.59	=	0.57	=
156-59-2	cis-1,2-Dichloroethene	63	U	0.21	U	0.15	U	0.16	U
10061-01-5	cis-1,3-Dichloropropene	0.61	U	1.1	U	0.76	U	0.80	U
98-82-8	Cumene	1,000	U	1.1	U	0.76	U	0.80	U
110-82-7	Cyclohexane	6,300	U	2.1	U	3.5	=	1.6	U
124-48-1	Dibromochloromethane	0.09	U	0.21	U	0.15	U	0.16	U
75-71-8	Dichlorodifluoromethane (CFC 12)	100	=	2	=	2.3	=	2.1	=
5989-27-5	d-Limonene	-	U	3	=	2.6	=	1.1	=
64-17-5	Ethanol	-	U	170	=	46	=	33	=
141-78-6	Ethyl Acetate	-	U	14	=	3.0	=	7.1	=
100-41-4	Ethylbenzene	0.97	U	1.1	U	0.83	=	0.83	=
87-68-3	Hexachlorobutadiene	0.11	U	1.1	U	0.76	U	0.80	U
179601-23-1	m,p-Xylenes	100	=	1.1	U	2.2	=	2.6	=
80-62-6	Methyl Methacrylate	-	U	2.1	U	1.5	U	1.6	U
1634-04-4	Methyl tert-Butyl Ether	9.4	U	0.21	U	0.15	U	0.22	=
75-09-2	Methylene Chloride	96	=	1.1	=	1.7	=	2.8	=
91-20-3	Naphthalene	0.072	U	1.1	U	0.76	U	0.80	U
123-86-4	n-Butyl Acetate	-	U	1.1	U	0.76	U	0.80	U
142-82-5	n-Heptane	-	U	5.3	=	1.3	=	1.2	=
110-54-3	n-Hexane	730	=	2.8	=	1.6	=	1.7	=
111-84-2	n-Nonane	-	U	1.5	=	1.2	=	0.80	U
111-65-9	n-Octane	-	U	6	=	4.5	=	0.80	U
103-65-1	n-Propylbenzene	1,000	U	1.1	U	0.76	U	0.80	U
95-47-6	o-Xylene	100	U	1.1	U	1.0	=	0.80	U
	Total Xylenes	100		1.1	U	3.20	=	2.60	=
115-07-1	Propene	-	=	36	=	1.8	=	3.5	=
100-42-5	Styrene	1,000	U	1.1	U	1.1	=	0.80	U
127-18-4	Tetrachloroethene	9.4	=	0.21	U	0.18	=	0.26	=
109-99-9	Tetrahydrofuran (THF)	-	U	1.1	U	0.76	U	0.80	U
108-88-3	Toluene	3,100	=	2.1	=	4.6	=	5.4	=
156-60-5	trans-1,2-Dichloroethene	63	U	0.21	U	0.15	U	0.16	U
10061-02-6	trans-1,3-Dichloropropene	0.61	U	1.1	U	0.76	U	0.80	U
79-01-6	Trichloroethene	0.43	U	0.21	U	0.15	U	0.16	U
75-69-4	Trichlorofluoromethane	730	=	1.1	=	1.2	=	1.2	=
76-13-1	Trichlorotrifluoroethane	31,000	=	0.54	=	0.54	=	0.52	=
108-05-4	Vinyl Acetate	-	U	11	U	7.6	U	8.0	U
75-01-4	Vinyl Chloride	0.16	U	0.21	U	0.15	U	0.16	U

Notes:

µg/m³ = micrograms per cubic meter

Qual = Lab Qualifier

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be detected by the method.

ND = Not Detected

U = Compound was analyzed for, but not detected above the laboratory detection limit.

JU = Estimated non-detect quantitation as a result of the validation process

J = Estimated quantitation as a result of the validation process

M = Matrix interference; results may be biased high.

L = Laboratory control sample recovery outside the specified limits, reanalyzed to determine if the sample is valid.

(=) Target compound was detected and confirmed to be present in the sample.

- = Regional Screening Level (RSL) does not exist for this parameter.

Bold indicates a detection.

Yellow highlight = Exceedance of

Appendix C-1
 Volatile Organic Compounds (VOCs) Analyzed Using EPA Method TC
 July 2012, October 2012, January 2013, and April 2013 Ambient Air at
 Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgeview

CAS#	Parameter	Sample Location Field Sample ID	PZAA-P5								PZAA-P6		
			PZAA-P5-072012	PZAA-P5-102412	PZAA-P5-010913	PZAA-P5-041013	PZAA-P6-072012	PZAA-P6-102412	PZAA-P6-072012	PZAA-P6-102412	PZAA-P6-072012	PZAA-P6-102412	
71-55-6	1,1,1-Trichloroethane	5,200	0.15	U	0.15	U	0.14	U	0.15	U	0.16	U	0.15
79-34-5	1,1,2,2-Tetrachloroethane	0.042	0.15	U	0.15	U	0.14	U	0.15	U	0.16	U	0.15
79-00-5	1,1,2-Trichloroethane	0.15	0.15	U	0.15	U	0.14	U	0.15	U	0.16	U	0.15
75-34-3	1,1-Dichloroethane	1.5	0.15	U	0.15	U	0.14	U	0.15	U	0.16	U	0.15
75-35-4	1,1-Dichloroethene	210	0.15	U	0.15	U	0.14	U	0.15	U	0.16	U	0.15
120-82-1	1,2,4-Trichlorobenzene	2.1	0.73	U	0.77	U	0.69	U	0.75	U	0.80	U	0.77
95-63-6	1,2,4-Trimethylbenzene	7.3	1.1	=	0.77	U	0.69	U	0.75	U	1.3	=	0.77
96-12-8	1,2-Dibromo-3-chloropropane	-	0.73	U	0.77	U	0.69	U	0.75	UJ	0.80	U	0.77
106-93-4	1,2-Dibromoethane	0.0041	0.15	U	0.15	U	0.14	U	0.15	U	0.16	U	0.15
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	-	0.73	U	0.77	U	0.69	U	0.75	U	0.80	U	0.77
95-50-1	1,2-Dichlorobenzene	210	0.15	U	0.15	U	0.14	U	0.15	U	0.16	U	0.15
107-06-2	1,2-Dichloroethane	0.094	0.15	U	0.26	=	0.14	U	0.15	U	0.16	U	0.27
78-87-5	1,2-Dichloropropane	0.24	0.15	U	0.15	U	0.14	U	0.15	U	0.17	=	0.15
108-67-8	1,3,5-Trimethylbenzene	7.3	0.73	U	0.77	U	0.69	U	0.75	U	0.80	U	0.77
106-99-0	1,3-Butadiene	0.081	0.34	=	0.50	=	0.28	U	0.3	U	0.71	=	0.57
541-73-1	1,3-Dichlorobenzene	210	0.79	=	0.15	U	0.14	U	0.15	U	0.52	=	0.15
106-46-7	1,4-Dichlorobenzene	0.22	0.15	U	0.29	=	0.14	U	0.15	U	0.16	U	0.3
123-91-1	1,4-Dioxane	0.32	0.73	U	0.77	U	0.69	U	0.75	U	0.80	U	0.77
78-93-3	2-Butanone (MEK)	5,200	9.7	=	8.5	=	6.9	U	7.5	U	16	=	12
591-78-6	2-Hexanone	31	0.73	U	0.96	U	0.69	U	0.75	U	0.80	U	1.2
67-63-0	2-Propanol (Isopropyl Alcohol)	-	7.3	U	9.2	=	6.9	U	7.5	U	8.0	U	9.4
107-05-1	3-Chloro-1-propene (Allyl Chloride)	-	0.15	U	0.15	U	0.14	U	0.15	U	0.16	U	0.15
622-96-8	4-Ethyltoluene	-	0.73	U	0.77	U	0.69	U	0.75	U	0.80	U	0.77
108-10-1	4-Methyl-2-pentanone	3,100	0.73	U	0.77	U	0.69	U	0.75	U	0.80	U	2.4
67-64-1	Acetone	32,000	350	=	110	=	8.1	=	20	=	600	=	160
75-05-8	Acetonitrile	-	0.73	U	0.84	=	0.69	U	1.7	=	0.80	U	0.86
107-02-8	Acrolein	-	18	=	5.0	=	2.8	U	3	U	33	=	6.2
107-13-1	Acrylonitrile	-	0.73	U	0.77	U	0.69	U	0.75	U	0.80	U	0.77
80-56-8	alpha-Pinene	-	11	=	1.4	=	1.5	=	0.75	U	14	=	1.5
71-43-2	Benzene	0.31	0.90	=	1.6	=	2	=	1.1	=	1.6	=	2.6
100-44-7	Benzyl Chloride	0.05	0.73	U	0.77	U	0.69	U	0.75	UJ	0.80	U	0.77
75-27-4	Bromodichloromethane	42	0.15	U	0.15	U	0.14	U	0.2	=	0.16	U	0.15
75-25-2	Bromoform	2.2	0.73	U	0.77	U	0.69	U	0.75	U	0.80	U	0.77
74-83-9	Bromomethane	5.2	0.15	U	0.15	U	0.14	U	0.15	U	0.22	=	0.15
75-15-0	Carbon Disulfide	730	7.3	U	7.7	U	6.9	U	7.5	U	8.0	U	7.7
56-23-5	Carbon Tetrachloride	0.41	0.45	=	0.45	=	0.47	=	0.49	=	0.48	=	0.40
108-90-7	Chlorobenzene	52	0.15	U	0.15	U	0.39	=	0.15	U	0.16	U	0.15
75-00-3	Chloroethane	10,000	0.15	U	0.15	U	0.14	U	0.15	U	0.28	=	0.15
67-66-3	Chloroform	0.11	0.19	=	0.31	=	0.21	=	0.56	=	0.23	=	0.26
74-87-3	Chloromethane	94	1.1	=	0.59	=	0.55	=	0.34	=	1.7	=	0.60
156-59-2	cis-1,2-Dichloroethene	63	0.15	U	0.15	U	0.14	U	0.15	U	0.16	U	0.15
10061-01-5	cis-1,3-Dichloropropene	0.61	0.73	U	0.77	U	0.69	U	0.75	U	0.80	U	0.77
98-82-8	Cumene	1,000	0.73	U	0.77	U	0.69	U	0.75	U	0.80	U	0.77
110-82-7	Cyclohexane	6,300	2.8	=	1.5	U	1.4	U	1.5	U	2.7	=	1.5
124-48-1	Dibromochloromethane	0.09	0.15	U	0.15	U	0.14	U	0.15	U	0.16	U	0.15
75-71-8	Dichlorodifluoromethane (CFC 12)	100	2.3	=	2.1	=	2.2	=	1.9	=	2.1	=	2.1
5989-27-5	d-Limonene	-	2.2	=	1.4	=	0.69	U	0.75	U	2.4	=	1.4
64-17-5	Ethanol	-	45	=	24	=	6.9	U	45	=	72	=	32
141-78-6	Ethyl Acetate	-	4.1	=	6.8	=	1.4	U	4.2	=	4.7	=	8.6
100-41-4	Ethylbenzene	0.97	0.79	=	0.84	=	0.69	U	0.75	U	0.84	=	0.96
87-68-3	Hexachlorobutadiene	0.11	0.73	U	0.77	U	0.69	U	0.75	U	0.80	U	0.77
179601-23-1	m,p-Xylenes	100	1.9	=	2.8	=	1.3	=	1.2	=	2.2	=	3.1
80-62-6	Methyl Methacrylate	-	1.5	U	1.5	U	1.4	U	1.5	U	1.6	U	1.5
1634-04-4	Methyl tert-Butyl Ether	9.4	0.15	U	0.19	=	0.14	U	0.15	U	0.16	U	0.15
75-09-2	Methylene Chloride	96	1.1	=	2.7	=	0.83	=	0.87	=	1.2	=	2.7
91-20-3	N												

Appendix C-1
 Volatile Organic Compounds (VOCs) Analyzed Using EPA Method TC
 July 2012, October 2012, January 2013, and April 2013 Ambient Air I
 Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgeview

CAS#	Parameter	Sample Location	PZAA-P7								
			Field Sample ID	PZAA-P6-010913	PZAA-P6-041013	PZAA-P7-072012	PZAA-P7-102412	PZAA-P7-010913			
71-55-6	1,1,1-Trichloroethane	5,200	U	0.14	U	0.15	U	0.16	U	0.15	U
79-34-5	1,1,2,2-Tetrachloroethane	0.042	U	0.14	U	0.15	U	0.16	U	0.15	U
79-00-5	1,1,2-Trichloroethane	0.15	U	0.14	U	0.15	U	0.16	U	0.15	U
75-34-3	1,1-Dichloroethane	1.5	U	0.14	U	0.15	U	0.16	U	0.15	U
75-35-4	1,1-Dichloroethene	210	U	0.14	U	0.15	U	0.16	U	0.15	U
120-82-1	1,2,4-Trichlorobenzene	2.1	U	0.69	U	0.75	U	0.80	U	0.75	U
95-63-6	1,2,4-Trimethylbenzene	7.3	U	0.69	U	0.75	U	0.80	U	0.75	U
96-12-8	1,2-Dibromo-3-chloropropane	-	U	0.69	U	0.75	UJ	0.80	U	0.75	U
106-93-4	1,2-Dibromoethane	0.0041	U	0.14	U	0.15	U	0.16	U	0.15	U
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	-	U	0.69	U	0.75	U	0.80	U	0.75	U
95-50-1	1,2-Dichlorobenzene	210	U	0.14	U	0.15	U	0.16	U	0.15	U
107-06-2	1,2-Dichloroethane	0.094	=	0.14	U	0.15	U	0.16	U	0.40	=
78-87-5	1,2-Dichloropropane	0.24	U	0.14	U	0.15	U	0.16	U	0.15	U
108-67-8	1,3,5-Trimethylbenzene	7.3	U	0.69	U	0.75	U	0.80	U	0.75	U
106-99-0	1,3-Butadiene	0.081	=	0.27	U	0.3	U	0.32	U	0.45	=
541-73-1	1,3-Dichlorobenzene	210	U	0.14	U	0.15	U	0.16	U	0.15	U
106-46-7	1,4-Dichlorobenzene	0.22	=	0.14	U	0.15	U	0.16	U	0.36	=
123-91-1	1,4-Dioxane	0.32	U	0.69	U	0.75	U	0.80	U	0.75	U
78-93-3	2-Butanone (MEK)	5,200	=	6.9	U	7.5	U	8.0	U	13	=
591-78-6	2-Hexanone	31	=	0.69	U	0.75	U	0.80	U	1.9	=
67-63-0	2-Propanol (Isopropyl Alcohol)	-	=	6.9	U	7.5	U	8.0	U	12.0	=
107-05-1	3-Chloro-1-propene (Allyl Chloride)	-	U	0.14	U	0.15	U	0.16	U	0.15	U
622-96-8	4-Ethyltoluene	-	U	0.69	U	0.75	U	0.80	U	0.75	U
108-10-1	4-Methyl-2-pentanone	3,100	=	0.69	U	0.75	U	0.80	U	0.75	U
67-64-1	Acetone	32,000	=	7	=	14	=	17	=	190	=
75-05-8	Acetonitrile	-	=	0.69	U	1.5	=	0.80	U	0.95	=
107-02-8	Acrolein	-	=	2.7	U	3	U	3.2	U	8.8	=
107-13-1	Acrylonitrile	-	U	0.69	U	0.75	U	0.80	U	0.75	U
80-56-8	alpha-Pinene	-	=	1.6	=	0.75	U	0.80	U	1.9	=
71-43-2	Benzene	0.31	=	1.3	=	1.2	=	0.60	=	2.5	=
100-44-7	Benzyl Chloride	0.05	U	0.69	U	0.75	UJ	0.80	U	0.75	U
75-27-4	Bromodichloromethane	42	U	0.14	U	0.2	=	0.16	U	0.15	U
75-25-2	Bromoform	2.2	U	0.69	U	0.75	U	0.80	U	0.75	U
74-83-9	Bromomethane	5.2	U	0.14	U	0.15	=	0.16	U	0.15	U
75-15-0	Carbon Disulfide	730	U	6.9	U	7.5	U	8.0	U	7.5	U
56-23-5	Carbon Tetrachloride	0.41	=	0.48	=	0.5	=	0.45	=	0.54	=
108-90-7	Chlorobenzene	52	U	0.14	U	0.15	U	0.16	U	0.15	U
75-00-3	Chloroethane	10,000	U	0.14	U	0.15	U	0.16	U	0.15	U
67-66-3	Chloroform	0.11	=	0.22	=	0.59	=	0.17	=	0.35	=
74-87-3	Chloromethane	94	=	0.57	=	0.45	=	0.40	=	0.68	=
156-59-2	cis-1,2-Dichloroethene	63	U	0.14	U	0.15	U	0.16	U	0.15	U
10061-01-5	cis-1,3-Dichloropropene	0.61	U	0.69	U	0.75	U	0.80	U	0.75	U
98-82-8	Cumene	1,000	U	0.69	U	0.75	U	0.80	U	0.75	U
110-82-7	Cyclohexane	6,300	U	1.4	U	1.5	U	1.6	U	1.5	U
124-48-1	Dibromochloromethane	0.09	U	0.14	U	0.15	U	0.16	U	0.15	U
75-71-8	Dichlorodifluoromethane (CFC 12)	100	=	2.1	=	2.2	=	2.3	=	2.6	=
5989-27-5	d-Limonene	-	=	0.69	U	0.75	U	0.80	U	1.6	=
64-17-5	Ethanol	-	=	10	=	15	=	11	=	30	=
141-78-6	Ethyl Acetate	-	=	3.4	=	9.5	=	5.2	=	5.9	=
100-41-4	Ethylbenzene	0.97	=	0.69	U	0.75	U	0.80	U	0.97	=
87-68-3	Hexachlorobutadiene	0.11	U	0.69	U	0.75	U	0.80	U	0.75	U
179601-23-1	m,p-Xylenes	100	=	1.2	=	0.9	=	1.7	=	3.2	=
80-62-6	Methyl Methacrylate	-	U	1.4	U	1.5	U	1.6	U	0.15	U
1634-04-4	Methyl tert-Butyl Ether	9.4	U	0.14	U	0.15	U	0.16	U	0.21	=
75-09-2	Methylene Chloride	96	=	0.78	=	0.86	=	0.89	=	2.5	=
91-20-3	Naphthalene	0.072	U	0.69	U	0.75	U	0.80	U	0.75	U
123-86-4	n-Butyl Acetate	-	U	0.69	U	0.75	U	0.80	U	0.85	=
142-82-5	n-Heptane	-	=	0.69	U	0.75	U	0.80	U	1.4	=
110-54-3	n-Hexane	730	=	0.9	=	0.75	U	0.80	U	1.9	=
111-84-2	n-Nonane	-	U	0.69	U	0.75	U	0.80	U	0.75	U
111-65-9	n-Octane	-	=	0.69	U	0.75	U	0.80	U	1.0	=
103-65-1	n-Propylbenzene	1,000	U	0.69	U	0.75	U	0.80	U	0.75	U
95-47-6	o-Xylene	100	U	0.69	U	0.75	U	0.80	U	0.75	U
	Total Xylenes	100	=	1.2	=	0.9	=	1.7	=	3.20	=
115-07-1	Propene	-	=	1.8	=	1.1	=	1.4	M1	5.0	=
100-42-5	Styrene	1,000	=	0.69	U	0.75	U	0.80	U	0.75	U
127-18-4	Tetrachloroethene	9.4	=	0.17	=	0.15	U	0.18	=	0.36	=
109-99-9	Tetrahydrofuran (THF)	-	U	0.69	U	0.75	U	0.80	U	1.3	=
108-88-3	Toluene	3,100	=	2.8	=	2.1	=	2.1	=	6	=
156-60-5	trans-1,2-Dichloroethene	63	U	0.14	U	0.15	U	0.16	U	0.15	U
10061-02-6	trans-1,3-Dichloropropene	0.61	U	0.69</td							

Appendix C-1
 Volatile Organic Compounds (VOCs) Analyzed Using EPA Method TC
*July 2012, October 2012, January 2013, and April 2013 Ambient Air at
 Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgeview*

CAS#	Parameter	Sample Location	PZAA-P8					
			Field Sample ID	PZAA-P7-041013	PZAA-P8-072012	PZAA-P8-102412		
71-55-6	1,1,1-Trichloroethane	5,200		0.16	U	0.16	U	0.15
79-34-5	1,1,2,2-Tetrachloroethane	0.042		0.16	U	0.16	U	0.15
79-00-5	1,1,2-Trichloroethane	0.15		0.16	U	0.16	U	0.15
75-34-3	1,1-Dichloroethane	1.5		0.16	U	0.16	U	0.15
75-35-4	1,1-Dichloroethene	210		0.16	U	0.16	U	0.15
120-82-1	1,2,4-Trichlorobenzene	2.1		0.78	U	0.82	U	0.75
95-63-6	1,2,4-Trimethylbenzene	7.3		0.78	U	0.92	=	0.75
96-12-8	1,2-Dibromo-3-chloropropane	-		0.78	UJ	0.82	U	0.75
106-93-4	1,2-Dibromoethane	0.0041		0.16	U	0.16	U	0.15
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	-		0.78	U	0.82	U	0.75
95-50-1	1,2-Dichlorobenzene	210		0.16	=	0.16	U	0.15
107-06-2	1,2-Dichloroethane	0.094		0.16	U	0.16	U	0.40
78-87-5	1,2-Dichloropropane	0.24		0.16	U	0.16	U	0.15
108-67-8	1,3,5-Trimethylbenzene	7.3		0.78	U	0.82	U	0.75
106-99-0	1,3-Butadiene	0.081		0.31	U	0.33	U	0.45
541-73-1	1,3-Dichlorobenzene	210		0.16	U	0.16	U	0.15
106-46-7	1,4-Dichlorobenzene	0.22		0.16	U	0.16	U	0.36
123-91-1	1,4-Dioxane	0.32		0.78	U	0.82	U	0.75
78-93-3	2-Butanone (MEK)	5,200		7.8	U	8.2	U	13
591-78-6	2-Hexanone	31		0.78	U	0.82	U	1.9
67-63-0	2-Propanol (Isopropyl Alcohol)	-		7.8	U	8.2	U	12.0
107-05-1	3-Chloro-1-propene (Allyl Chloride)	-		0.16	U	0.16	U	0.15
622-96-8	4-Ethyltoluene	-		0.78	U	0.82	U	0.75
108-10-1	4-Methyl-2-pentanone	3,100		0.78	U	0.82	U	0.75
67-64-1	Acetone	32,000		21	=	15	=	190
75-05-8	Acetonitrile	-		0.78	U	0.82	U	0.95
107-02-8	Acrolein	-		3.1	U	3.3	U	8.8
107-13-1	Acrylonitrile	-		0.78	U	0.82	U	0.75
80-56-8	alpha-Pinene	-		1.1	=	0.82	U	1.9
71-43-2	Benzene	0.31		4.4	=	0.69	=	2.5
100-44-7	Benzyl Chloride	0.05		0.78	UJ	0.82	U	0.75
75-27-4	Bromodichloromethane	42		0.16	U	0.16	U	0.15
75-25-2	Bromoform	2.2		0.78	U	0.82	U	0.75
74-83-9	Bromomethane	5.2		0.16	U	0.16	U	0.15
75-15-0	Carbon Disulfide	730		7.8	U	8.2	U	7.5
56-23-5	Carbon Tetrachloride	0.41		0.5	=	0.50	=	0.54
108-90-7	Chlorobenzene	52		0.93	=	0.16	U	0.15
75-00-3	Chloroethane	10,000		0.16	U	0.16	U	0.15
67-66-3	Chloroform	0.11		0.28	=	0.27	=	0.35
74-87-3	Chloromethane	94		0.44	=	0.44	=	0.68
156-59-2	cis-1,2-Dichloroethene	63		0.16	U	0.16	U	0.15
10061-01-5	cis-1,3-Dichloropropene	0.61		0.78	U	0.82	U	0.75
98-82-8	Cumene	1,000		0.78	U	0.82	U	0.75
110-82-7	Cyclohexane	6,300		1.6	U	1.6	U	1.5
124-48-1	Dibromochloromethane	0.09		0.16	U	0.16	U	0.15
75-71-8	Dichlorodifluoromethane (CFC 12)	100		2.2	=	2.5	=	2.6
5989-27-5	d-Limonene	-		0.78	U	0.82	U	1.6
64-17-5	Ethanol	-		15	=	13	=	30
141-78-6	Ethyl Acetate	-		2.9	=	2.5	=	5.9
100-41-4	Ethylbenzene	0.97		0.78	U	1.3	=	0.97
87-68-3	Hexachlorobutadiene	0.11		0.78	U	0.82	U	0.75
179601-23-1	m,p-Xylenes	100		0.9	=	5.0	=	3.2
80-62-6	Methyl Methacrylate	-		1.6	U	1.6	U	ND
1634-04-4	Methyl tert-Butyl Ether	9.4		0.16	U	0.16	U	0.21
75-09-2	Methylene Chloride	96		0.78	U	0.87	=	2.5
91-20-3	Naphthalene	0.072		0.78	U	0.82	U	0.75
123-86-4	n-Butyl Acetate	-		0.78	U	0.82	U	0.85
142-82-5	n-Heptane	-		0.78	U	0.82	U	1.4
110-54-3	n-Hexane	730		0.78	U	0.82	U	1.9
111-84-2	n-Nonane	-		0.78	U	0.82	U	0.75
111-65-9	n-Octane	-		0.78	U	0.82	U	1.0
103-65-1	n-Propylbenzene	1,000		0.78	U	0.82	U	0.75
95-47-6	o-Xylene	100		0.78	U	0.88	=	0.75
	Total Xylenes	100		0.9	=	5.88	=	3.20
115-07-1	Propene	-		1.5	=	1.5	M1	5.0
100-42-5	Styrene	1,000		0.78	U	0.82	U	0.75
127-18-4	Tetrachloroethene	9.4		0.16	U	0.22	=	0.36
109-99-9	Tetrahydrofuran (THF)	-		0.78	U	0.82	U	1.3
108-88-3	Toluene	3,100		2.1	=	3.5	=	6
156-60-5	trans-1,2-Dichloroethene	63		0.16	U	0.16	U	0.15
10061-02-6	trans-1,3-Dichloropropene	0.61		0.78	U	0.82	U	0.75
79-01-6	Trichloroethene	0.43		0.16	U	0.24	=	0.15
75-69-4	Trichlorofluoromethane	730		1.2	=	1.3	=	1.6
76-13-1	Trichlorotrifluoroethane	31,000		0.58	=	0.54	=	0.63
108-05-4	Vinyl Acetate	-		7.8	U	8.2	U	7.5
75-01-4	Vinyl Chloride	0.16		0.16	U	0.16	U	0.15

Notes:

µg/m³ = micrograms per cubic meter

Qual = Lab Qualifier

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be detected.

ND = Not Detected

U = Compound was analyzed for, but not detected above the laboratory detection limit.

UJ = Estimated non-detect quantitation as a result of the validation process.

J = Estimated quantitation as a result of the validation process.

M = Matrix interference; results may be biased high.

L = Laboratory control sample recovery outside the specified limits, reanalyzed.

(=) Target compound was detected and confirmed to be present in the sample.

- = Regional Screening Level (RSL) does not exist for this parameter.

Bold indicates a detection.

Yellow highlight = Exceedance of the RSL

RSLs are the residential values published November 2012,

http://www.epa.gov/reg3hwmd/risk/human/rb-concentration_table/Generic.xls

Appendix C-1
 Volatile Organic Compounds (VOCs) Analyzed Using EPA Method TC
 July 2012, October 2012, January 2013, and April 2013 Ambient Air I
 Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgeview

CAS#	Parameter	Sample Location	PZAA-C1								
			Field Sample ID	PZAA-P8-010913	PZAA-P8-041013	PZAA-C1-072012	PZAA-C1-102412	PZAA-C1-010913			
71-55-6	1,1,1-Trichloroethane	5,200		0.16	U	0.15	U	0.15	0.16	U	0.14
79-34-5	1,1,2,2-Tetrachloroethane	0.042		0.16	U	0.15	U	0.15	0.16	U	0.14
79-00-5	1,1,2-Trichloroethane	0.15		0.16	U	0.15	U	0.15	0.16	U	0.14
75-34-3	1,1-Dichloroethane	1.5		0.16	U	0.15	U	0.15	0.16	U	0.14
75-35-4	1,1-Dichloroethene	210		0.16	U	0.15	U	0.15	0.16	U	0.14
120-82-1	1,2,4-Trichlorobenzene	2.1		0.8	U	0.77	U	0.75	0.78	U	0.7
95-63-6	1,2,4-Trimethylbenzene	7.3		0.8	U	0.77	U	0.94	0.78	U	0.7
96-12-8	1,2-Dibromo-3-chloropropane	-		0.8	U	0.77	U	0.75	0.78	U	0.7
106-93-4	1,2-Dibromoethane	0.0041		0.16	U	0.15	U	0.15	0.16	U	0.14
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	-		0.8	U	0.77	U	0.75	0.78	U	0.7
95-50-1	1,2-Dichlorobenzene	210		0.16	U	0.15	U	0.15	0.16	U	0.14
107-06-2	1,2-Dichloroethane	0.094		0.16	U	0.15	U	0.15	0.19	=	0.14
78-87-5	1,2-Dichloropropane	0.24		0.16	U	0.15	U	0.15	0.16	U	0.14
108-67-8	1,3,5-Trimethylbenzene	7.3		0.8	U	0.77	U	0.75	0.78	U	0.7
106-99-0	1,3-Butadiene	0.081		0.32	U	0.31	U	0.30	0.35	=	0.28
541-73-1	1,3-Dichlorobenzene	210		0.16	U	0.15	U	0.15	0.16	U	0.14
106-46-7	1,4-Dichlorobenzene	0.22		0.16	U	0.15	U	0.15	0.38	=	0.14
123-91-1	1,4-Dioxane	0.32		0.8	U	0.77	U	0.75	0.78	U	0.7
78-93-3	2-Butanone (MEK)	5,200		8	U	7.7	U	7.5	8.1	=	7
591-78-6	2-Hexanone	31		0.8	U	0.77	U	0.75	0.96	=	0.7
67-63-0	2-Propanol (Isopropyl Alcohol)	-		8	U	7.7	U	7.5	7.8	U	7
107-05-1	3-Chloro-1-propene (Allyl Chloride)	-		0.16	U	0.15	U	0.15	0.16	U	0.14
622-96-8	4-Ethyltoluene	-		0.8	U	0.77	U	0.75	0.78	U	0.7
108-10-1	4-Methyl-2-pentanone	3,100		0.8	U	0.77	U	0.75	0.78	U	0.7
67-64-1	Acetone	32,000		8	U	21	=	16	100	=	8.3
75-05-8	Acetonitrile	-		0.8	U	0.77	U	0.75	0.78	U	0.7
107-02-8	Acrolein	-		3.2	U	3.1	U	3.0	4.5	=	2.8
107-13-1	Acrylonitrile	-		0.8	U	0.77	U	0.75	0.78	U	0.7
80-56-8	alpha-Pinene	-		2	=	1.7	=	0.75	1.5	=	1.9
71-43-2	Benzene	0.31		1.4	=	6	=	0.82	1.9	=	3.7
100-44-7	Benzyl Chloride	0.05		0.8	U	0.77	UJ	0.75	0.78	U	0.7
75-27-4	Bromodichloromethane	42		0.16	U	0.15	U	0.15	0.16	U	0.14
75-25-2	Bromoform	2.2		0.8	U	0.77	U	0.75	0.78	U	0.7
74-83-9	Bromomethane	5.2		0.16	U	0.15	U	0.15	0.16	U	0.14
75-15-0	Carbon Disulfide	730		8	U	7.7	U	7.5	7.8	U	7
56-23-5	Carbon Tetrachloride	0.41		0.48	=	0.39	=	0.47	0.55	=	0.4
108-90-7	Chlorobenzene	52		0.16	U	0.22	=	0.15	0.16	U	0.43
75-00-3	Chloroethane	10,000		0.16	U	0.15	U	0.15	0.16	U	0.14
67-66-3	Chloroform	0.11		0.16	=	0.32	=	0.18	0.28	=	0.19
74-87-3	Chloromethane	94		0.55	=	0.58	=	0.45	0.66	=	0.57
156-59-2	cis-1,2-Dichloroethene	63		0.16	U	0.15	U	0.15	0.16	U	0.14
10061-01-5	cis-1,3-Dichloropropene	0.61		0.8	U	0.77	U	0.75	0.78	U	0.7
98-82-8	Cumene	1,000		0.8	U	0.77	U	0.75	0.78	U	0.7
110-82-7	Cyclohexane	6,300		1.6	U	1.5	U	1.5	1.6	U	1.4
124-48-1	Dibromochloromethane	0.09		0.16	U	0.15	U	0.15	0.16	U	0.14
75-71-8	Dichlorodifluoromethane (CFC 12)	100		2.2	=	2.5	=	2.5	2.7	=	2.2
5989-27-5	d-Limonene	-		0.8	U	1.3	=	0.75	1.3	=	0.7
64-17-5	Ethanol	-		8	U	100	=	47	31	=	7.4
141-78-6	Ethyl Acetate	-		1.7	=	18	=	6.6	8.7	=	1.4
100-41-4	Ethylbenzene	0.97		0.8	U	0.77	U	1.3	0.97	=	0.7
87-68-3	Hexachlorobutadiene	0.11		0.8	U	0.77	U	0.75	0.78	U	0.7
179601-23-1	m,p-Xylenes	100		1.2	=	1.4	=	4.8	3.3	=	1.3
80-62-6	Methyl Methacrylate	-		1.6	U	1.5	U	1.5	0.16	U	1.4
1634-04-4	Methyl tert-Butyl Ether	9.4		0.16	U	0.15	U	0.15	0.16	U	0.14
75-09-2	Methylene Chloride	96		1.2	=	1	=	1.3	2.3	=	0.81
91-20-3	Naphthalene	0.072		0.8	U	0.78	=	0.75	0.78	U	0.7
123-86-4	n-Butyl Acetate	-		0.8	U	0.77	U	0.77	1.1	=	0.7
142-82-5	n-Heptane	-		0.8	U	0.77	U	0.86	1.3	=	0.7
110-54-3	n-Hexane	730		0.98	=	0.88	=	0.83	1.9	=	0.95
111-84-2	n-Nonane	-		0.8	U	0.77	U	0.75	0.78	U	0.7
111-65-9	n-Octane	-		0.8	U	0.77	U	0.75	0.89	=	0.7
103-65-1	n-Propylbenzene	1,000		0.8	U	0.77	U	0.75	0.78	U	0.7
95-47-6	o-Xylene	100		0.8	U	0.77	U	0.90	0.89	=	0.7
	Total Xylenes	100		1.2	=	1.4	=	5.70	4.19	=	1.3
115-07-1	Propene	-		1.5	=	1.1	=	1.7	3.6	=	1.5
100-42-5	Styrene	1,000		0.8	U	0.77	U	0.75	0.78	U	0.7
127-18-4	Tetrachloroethene	9.4		0.19	=	0.					

Appendix C-1
 Volatile Organic Compounds (VOCs) Analyzed Using EPA Method TC
 July 2012, October 2012, January 2013, and April 2013 Ambient Air at
 Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgeview

CAS#	Parameter	Sample Location	PZAA-C2							
			Field Sample ID	PZAA-C1-041013	PZAA-C2-072012		PZAA-C2-102412		PZAA-C2-010913	PZAA-C2-041013
71-55-6	1,1,1-Trichloroethane	5,200		0.15	U	0.15	U	0.15	U	0.14
79-34-5	1,1,2,2-Tetrachloroethane	0.042		0.15	U	0.15	U	0.16	U	0.14
79-00-5	1,1,2-Trichloroethane	0.15		0.15	U	0.15	U	0.16	U	0.14
75-34-3	1,1-Dichloroethane	1.5		0.15	U	0.15	U	0.15	U	0.14
75-35-4	1,1-Dichloroethene	210		0.15	U	0.15	U	0.15	U	0.14
120-82-1	1,2,4-Trichlorobenzene	2.1		0.73	U	0.77	U	0.76	U	0.72
95-63-6	1,2,4-Trimethylbenzene	7.3		0.73	U	0.81	=	0.76	U	0.72
96-12-8	1,2-Dibromo-3-chloropropane	-		0.73	UJ	0.77	U	0.76	U	0.72
106-93-4	1,2-Dibromoethane	0.0041		0.15	U	0.15	U	0.16	U	0.14
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	-		0.73	U	0.77	U	0.76	U	0.72
95-50-1	1,2-Dichlorobenzene	210		0.15	U	0.15	U	0.16	U	0.14
107-06-2	1,2-Dichloroethane	0.094		0.15	U	0.15	U	0.23	=	0.14
78-87-5	1,2-Dichloropropane	0.24		0.15	U	0.15	U	0.15	U	0.14
108-67-8	1,3,5-Trimethylbenzene	7.3		0.73	U	0.77	U	0.76	U	0.72
106-99-0	1,3-Butadiene	0.081		0.29	U	0.31	U	0.54	=	0.29
541-73-1	1,3-Dichlorobenzene	210		0.15	U	0.15	U	0.16	U	0.14
106-46-7	1,4-Dichlorobenzene	0.22		0.15	U	0.15	U	0.37	=	0.14
123-91-1	1,4-Dioxane	0.32		0.73	U	0.77	U	0.76	U	0.72
78-93-3	2-Butanone (MEK)	5,200		7.3	U	7.7	U	11	=	7.2
591-78-6	2-Hexanone	31		0.73	U	0.77	U	1.2	=	0.72
67-63-0	2-Propanol (Isopropyl Alcohol)	-		7.3	U	7.7	U	9.0	=	11
107-05-1	3-Chloro-1-propene (Allyl Chloride)	-		0.15	U	0.15	U	0.15	U	ND
622-96-8	4-Ethyltoluene	-		0.73	U	0.77	U	0.76	U	0.72
108-10-1	4-Methyl-2-pentanone	3,100		0.98	=	0.77	U	0.76	U	0.72
67-64-1	Acetone	32,000		16	=	13	=	140	=	10
75-05-8	Acetonitrile	-		2.6	=	0.77	U	1.2	=	0.72
107-02-8	Acrolein	-		2.9	U	3.1	U	5.7	=	2.9
107-13-1	Acrylonitrile	-		0.73	U	0.77	U	0.76	U	0.72
80-56-8	alpha-Pinene	-		0.73	U	0.77	U	1.6	=	1.8
71-43-2	Benzene	0.31		3.7	=	1.0	=	3.2	=	2.9
100-44-7	Benzyl Chloride	0.05		0.73	UJ	0.77	U	0.76	U	0.72
75-27-4	Bromodichloromethane	42		0.15	U	0.15	U	0.15	U	0.14
75-25-2	Bromoform	2.2		0.73	U	0.77	U	0.76	U	0.72
74-83-9	Bromomethane	5.2		0.15	U	0.15	U	0.15	U	0.14
75-15-0	Carbon Disulfide	730		7.3	U	7.7	U	7.6	U	7.2
56-23-5	Carbon Tetrachloride	0.41		0.5	=	0.46	=	0.43	=	0.32
108-90-7	Chlorobenzene	52		0.15	U	0.15	U	0.16	U	0.32
75-00-3	Chloroethane	10,000		0.15	U	0.15	U	0.15	U	0.14
67-66-3	Chloroform	0.11		0.23	=	0.18	=	0.24	=	0.19
74-87-3	Chloromethane	94		0.56	=	0.43	=	0.66	=	0.58
156-59-2	cis-1,2-Dichloroethene	63		0.15	U	0.15	U	0.15	U	0.14
10061-01-5	cis-1,3-Dichloropropene	0.61		0.73	U	0.77	U	0.76	U	0.72
98-82-8	Cumene	1,000		0.73	U	0.77	U	0.76	U	0.72
110-82-7	Cyclohexane	6,300		1.5	U	1.5	U	1.5	U	1.4
124-48-1	Dibromochloromethane	0.09		0.15	U	0.15	U	0.16	U	0.14
75-71-8	Dichlorodifluoromethane (CFC 12)	100		2.2	=	2.4	=	2.6	=	2.2
5989-27-5	d-Limonene	-		0.73	U	0.77	U	1.9	=	0.72
64-17-5	Ethanol	-		22	=	15	=	30	=	7.2
141-78-6	Ethyl Acetate	-		1.8	=	5.3	=	9.90	=	1.4
100-41-4	Ethylbenzene	0.97		0.73	U	1.1	=	0.98	=	0.72
87-68-3	Hexachlorobutadiene	0.11		0.73	U	0.77	U	0.76	U	0.72
179601-23-1	m,p-Xylenes	100		1.4	=	4.0	=	3.3	=	1.4
80-62-6	Methyl Methacrylate	-		1.5	U	1.5	U	1.5	U	1.4
1634-04-4	Methyl tert-Butyl Ether	9.4		0.15	U	0.15	U	0.21	=	0.14
75-09-2	Methylene Chloride	96		1.2	=	1.2	=	2.9	=	0.86
91-20-3	Naphthalene	0.072		0.73	U	0.77	U	0.76	U	0.72
123-86-4	n-Butyl Acetate	-		0.73	U	0.77	U	1.4	=	0.72
142-82-5	n-Heptane	-		0.76	=	0.81	=	1.4	=	0.72
110-54-3	n-Hexane	730		0.87	=	0.83	=	2.00	=	0.97
111-84-2	n-Nonane	-		0.73	U	0.77	U	0.76	U	0.72
111-65-9	n-Octane	-		0.73	U	0.77	U	1.0	=	0.72
103-65-1	n-Propylbenzene	1,000		0.73	U	0.77	U	0.76	U	0.72
95-47-6	o-Xylene	100		0.73	U	0.77	U	0.82	=	0.72
	Total Xylenes	100		1.4	=	4.0	=	3.3	=	1.4
115-07-1	Propene	-		1.3	=	1.5	M1	3.9	=	3.6
100-42-5	Styrene	1,000		ND	U	0.77	U	0.76	U	0.72
127-18-4	Tetrachloroethene	9.4		0.15	=	0.30	=	0.50	=	0.37
109-99-9	Tetrahydrofuran (THF)	-		0.73	U	0.77	U	0.76	U	0.72
108-88-3	Toluene	3,100		3.7	=	3.5	=	7.3	=	3.1
156-60-5	trans-1,2-Dichloroethene	63		0.15	U	0.15	U	0.15	U	0.14
10061-02-6	trans-1,3-Dichloropropene	0.61		0.73	U	0.77	U	0.76	U	0.72
79-01-6	Trichloroethene	0.43		0.15	U	0.17	=	0.15	U	0.14
75-69-4	Trichlorofluoromethane	730		1.1	=	1.3	=	1.6	=	1.2
76-13-										

Appendix C-1
 Volatile Organic Compounds (VOCs) Analyzed Using EPA Method TC
*July 2012, October 2012, January 2013, and April 2013 Ambient Air at
 Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgeview*

CAS#	Parameter	Sample Location Field Sample ID	PZAA-C3						
			PZAA-C3-072012	PZAA-C3-072012-D	PZAA-C3-102412	PZAA-C3-102412-D	PZAA-C3-010913		
71-55-6	1,1,1-Trichloroethane	5,200	0.15	U	0.14	U	0.16	U	0.13
79-34-5	1,1,2,2-Tetrachloroethane	0.042	0.15	U	0.14	U	0.16	U	0.13
79-00-5	1,1,2-Trichloroethane	0.15	0.15	U	0.14	U	0.16	U	0.13
75-34-3	1,1-Dichloroethane	1.5	0.15	U	0.14	U	0.16	U	0.13
75-35-4	1,1-Dichloroethene	210	0.15	U	0.14	U	0.16	U	0.13
120-82-1	1,2,4-Trichlorobenzene	2.1	0.76	U	0.71	U	0.78	U	0.67
95-63-6	1,2,4-Trimethylbenzene	7.3	0.76	U	0.71	U	0.78	U	0.67
96-12-8	1,2-Dibromo-3-chloropropane	-	0.76	U	0.71	U	0.78	U	0.67
106-93-4	1,2-Dibromoethane	0.0041	0.15	U	0.14	U	0.16	U	0.13
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	-	0.76	U	0.71	U	0.78	U	0.67
95-50-1	1,2-Dichlorobenzene	210	0.15	U	0.14	U	0.16	U	0.13
107-06-2	1,2-Dichloroethane	0.094	0.15	U	0.14	U	0.17	=	0.23
78-87-5	1,2-Dichloropropane	0.24	0.15	U	0.14	U	0.16	U	0.13
108-67-8	1,3,5-Trimethylbenzene	7.3	0.76	U	0.71	U	0.78	U	0.67
106-99-0	1,3-Butadiene	0.081	0.30	U	0.28	U	0.49	=	0.53
541-73-1	1,3-Dichlorobenzene	210	0.15	U	0.14	U	0.16	U	0.13
106-46-7	1,4-Dichlorobenzene	0.22	0.15	U	0.14	U	0.34	=	0.36
123-91-1	1,4-Dioxane	0.32	0.76	U	0.71	U	0.78	U	0.67
78-93-3	2-Butanone (MEK)	5,200	7.6	U	7.1	U	7.8	U	9.0
591-78-6	2-Hexanone	31	0.76	U	0.71	U	0.85	=	0.92
67-63-0	2-Propanol (Isopropyl Alcohol)	-	11	=	7.1	U	7.8	U	8.3
107-05-1	3-Chloro-1-propene (Allyl Chloride)	-	0.15	U	0.14	U	0.16	U	0.13
622-96-8	4-Ethyltoluene	-	0.76	U	0.71	U	0.78	U	0.67
108-10-1	4-Methyl-2-pentanone	3,100	0.76	U	0.71	U	0.78	U	0.67
67-64-1	Acetone	32,000	15	=	22	=	90	=	110
75-05-8	Acetonitrile	-	0.76	U	0.71	U	1.0	=	1.0
107-02-8	Acrolein	-	3.0	U	2.8	U	4.1	=	4.9
107-13-1	Acrylonitrile	-	0.76	U	0.71	U	0.78	U	0.67
80-56-8	alpha-Pinene	-	0.76	U	0.71	U	0.9	=	1.5
71-43-2	Benzene	0.31	1.3	=	1.3	=	7.7	=	7.6
100-44-7	Benzyl Chloride	0.05	0.76	U	0.71	U	0.78	U	0.67
75-27-4	Bromodichloromethane	42	0.15	U	0.14	U	0.16	U	0.13
75-25-2	Bromoform	2.2	0.76	U	0.71	U	0.78	U	0.67
74-83-9	Bromomethane	5.2	0.15	U	0.14	U	0.16	U	0.13
75-15-0	Carbon Disulfide	730	7.6	U	7.1	U	7.8	U	6.7
56-23-5	Carbon Tetrachloride	0.41	0.49	=	0.54	=	0.54	=	0.48
108-90-7	Chlorobenzene	52	0.15	U	0.14	U	0.16	U	0.43
75-00-3	Chloroethane	10,000	0.15	U	0.14	U	0.16	U	0.13
67-66-3	Chloroform	0.11	0.18	=	0.17	=	0.25	=	0.25
74-87-3	Chloromethane	94	0.38	=	0.39	=	0.64	=	0.67
156-59-2	cis-1,2-Dichloroethene	63	0.15	U	0.14	U	0.16	U	0.13
10061-01-5	cis-1,3-Dichloropropene	0.61	0.76	U	0.71	U	0.78	U	0.67
98-82-8	Cumene	1,000	0.76	U	0.71	U	0.78	U	0.67
110-82-7	Cyclohexane	6,300	1.5	U	1.4	U	1.6	U	1.3
124-48-1	Dibromochloromethane	0.09	0.15	U	0.14	U	0.16	U	0.13
75-71-8	Dichlorodifluoromethane (CFC 12)	100	2.4	=	2.5	=	2.6	=	2.1
5989-27-5	d-Limonene	-	0.76	U	0.71	U	1.2	=	1.7
64-17-5	Ethanol	-	29	=	23	=	24	=	29
141-78-6	Ethyl Acetate	-	5.2	=	5.6	=	9.6	=	10
100-41-4	Ethylbenzene	0.97	0.84	=	0.88	=	0.94	=	0.99
87-68-3	Hexachlorobutadiene	0.11	0.76	U	0.71	U	0.78	U	0.67
179601-23-1	m,p-Xylenes	100	3.0	=	3.1	=	3.2	=	3.3
80-62-6	Methyl Methacrylate	-	1.5	U	1.4	U	0.16	U	1.30
1634-04-4	Methyl tert-Butyl Ether	9.4	0.15	U	0.14	U	0.16	U	0.18
75-09-2	Methylene Chloride	96	1.2	=	1.2	=	2.7	=	2.8
91-20-3	Naphthalene	0.072	0.76	U	0.71	U	0.78	U	0.67
123-86-4	n-Butyl Acetate	-	0.76	U	0.71	U	1.2	=	1.2
142-82-5	n-Heptane	-	0.77	=	0.71	U	1.3	=	1.4
110-54-3	n-Hexane	730	0.86	=	0.77	=	2.0	=	2.0
111-84-2	n-Nonane	-	0.76	U	0.71	U	0.78	U	0.67
111-65-9	n-Octane	-	0.76	U	0.71	U	0.85	=	0.89
103-65-1	n-Propylbenzene	1,000	0.76	U	0.71	U	0.78	U	0.67
95-47-6	o-Xylene	100	0.76	U	0.71	U	0.91	=	0.85
	Total Xylenes	100	3.0	=	3.1	=	4.11	=	4.15
115-07-1	Propene	-	4.4	J	1.7	J	3.2	=	4.0
100-42-5	Styrene	1,000	0.76	U	0.71	U	0.78	U	0.69
127-18-4	Tetrachloroethene	9.4	0.23	=	0.22	=	0.58	=	0.52
109-99-9	Tetrahydrofuran (THF)	-	0.76	U	0.71	U	0.78	U	0.67
108-88-3	Toluene	3,100	3.1	=	3.2	=	6.7	=	6.8
156-60-5	trans-1,2-Dichloroethene	63	0.15	U	0.14	U	0.16	U	0.13
10061-02-6	trans-1,3-Dichloropropene	0.61	0.76	U	0.71	U	0.78	U	0.67
79-01-6	Trichloroethene	0.43	0.15	U	0.14	U	0.16	U	0.13
75-69-4	Trichlorofluoromethane	730	1.3	=	1.3	=	1.5	=	1.5
76-13-1	Trichlorotrifluoroethane	31,000	0.57	=	0.58	=	0.66	=	0.66
108-05-4	Vinyl Acetate	-	7.6	U	7.1	U	7.8	U	6.7</

Appendix C-1
 Volatile Organic Compounds (VOCs) Analyzed Using EPA Method TC
 July 2012, October 2012, January 2013, and April 2013 Ambient Air I
 Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgeview

CAS#	Parameter	Sample Location									
		Field Sample ID	PZAA-C3-010913-D	PZAA-C3-041013		PZAA-C3-041013-D		PZAA-C4-072012		PZAA-C4-102412	
71-55-6	1,1,1-Trichloroethane	5,200	0.14	U	0.14	U	0.16	U	0.14	U	0.15
79-34-5	1,1,2,2-Tetrachloroethane	0.042	0.14	U	0.14	U	0.16	U	0.14	U	0.16
79-00-5	1,1,2-Trichloroethane	0.15	0.14	U	0.14	U	0.16	U	0.14	U	0.16
75-34-3	1,1-Dichloroethane	1.5	0.14	U	0.14	U	0.16	U	0.14	U	0.15
75-35-4	1,1-Dichloroethene	210	0.14	U	0.14	U	0.16	U	0.14	U	0.15
120-82-1	1,2,4-Trichlorobenzene	2.1	0.71	U	0.71	U	0.79	U	0.71	U	0.76
95-63-6	1,2,4-Trimethylbenzene	7.3	0.71	U	0.71	U	0.79	U	0.71	U	2.8
96-12-8	1,2-Dibromo-3-chloropropane	-	0.71	U	0.71	UJ	0.79	UJ	0.71	U	0.76
106-93-4	1,2-Dibromoethane	0.0041	0.14	U	0.14	U	0.16	U	0.14	U	0.16
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	-	0.71	U	0.71	U	0.79	U	0.71	U	0.76
95-50-1	1,2-Dichlorobenzene	210	0.14	U	0.14	U	0.16	=	0.21	=	0.16
107-06-2	1,2-Dichloroethane	0.094	0.14	U	0.14	U	0.16	U	0.14	U	2.1
78-87-5	1,2-Dichloropropane	0.24	0.14	U	0.14	U	0.16	U	0.14	U	0.7
108-67-8	1,3,5-Trimethylbenzene	7.3	0.71	U	0.71	U	0.79	U	0.71	U	0.78
106-99-0	1,3-Butadiene	0.081	0.28	U	0.28	U	0.32	U	0.28	U	0.63
541-73-1	1,3-Dichlorobenzene	210	0.14	U	0.14	U	0.16	U	0.14	U	0.16
106-46-7	1,4-Dichlorobenzene	0.22	0.14	U	0.14	U	0.16	U	0.14	U	0.42
123-91-1	1,4-Dioxane	0.32	0.71	U	0.71	U	0.79	U	0.71	U	0.76
78-93-3	2-Butanone (MEK)	5,200	7.1	U	7.1	U	7.9	U	7.1	U	12
591-78-6	2-Hexanone	31	0.71	U	0.71	U	0.79	U	0.71	U	0.76
67-63-0	2-Propanol (Isopropyl Alcohol)	-	7.1	U	7.1	U	7.9	U	7.1	U	8.3
107-05-1	3-Chloro-1-propene (Allyl Chloride)	-	0.14	U	0.14	U	0.16	U	0.14	U	0.15
622-96-8	4-Ethyltoluene	-	0.71	U	0.71	U	0.79	U	0.71	U	0.76
108-10-1	4-Methyl-2-pentanone	3,100	0.71	U	0.71	U	0.79	U	0.71	U	1.3
67-64-1	Acetone	32,000	7.5	=	16	=	16	=	14	=	130
75-05-8	Acetonitrile	-	0.71	U	3.3	=	2.6	=	0.71	U	1.1
107-02-8	Acrolein	-	2.8	U	2.8	U	3.2	U	2.8	U	6.2
107-13-1	Acrylonitrile	-	0.71	U	0.71	U	0.79	U	0.71	U	0.76
80-56-8	alpha-Pinene	-	1.8	=	0.71	U	0.79	U	0.71	U	3.1
71-43-2	Benzene	0.31	3.4	=	4.2	=	4	=	5.3	=	33
100-44-7	Benzyl Chloride	0.05	0.71	U	0.71	UJ	0.79	UJ	0.71	U	0.76
75-27-4	Bromodichloromethane	42	0.14	U	0.14	U	0.16	U	0.14	U	0.15
75-25-2	Bromoform	2.2	0.71	U	0.71	U	0.79	U	0.71	U	0.76
74-83-9	Bromomethane	5.2	0.14	U	0.14	U	0.16	U	0.14	U	0.15
75-15-0	Carbon Disulfide	730	7.1	U	7.1	U	7.9	U	7.1	U	7.6
56-23-5	Carbon Tetrachloride	0.41	0.49	=	0.54	=	0.44	=	0.46	=	0.54
108-90-7	Chlorobenzene	52	0.4	=	0.14	U	0.16	U	0.14	U	0.56
75-00-3	Chloroethane	10,000	0.14	U	0.14	U	0.16	U	0.14	U	0.15
67-66-3	Chloroform	0.11	0.18	=	0.24	=	0.21	=	0.20	=	0.28
74-87-3	Chloromethane	94	0.58	=	0.41	=	0.58	=	0.38	=	0.67
156-59-2	cis-1,2-Dichloroethene	63	0.14	U	0.14	U	0.16	U	0.14	U	0.15
10061-01-5	cis-1,3-Dichloropropene	0.61	0.71	U	0.71	U	0.79	U	0.71	U	0.76
98-82-8	Cumene	1,000	0.71	U	0.71	U	0.79	U	0.71	U	4.9
110-82-7	Cyclohexane	6,300	1.4	U	1.4	U	1.6	U	1.4	U	1.5
124-48-1	Dibromochloromethane	0.09	0.14	U	0.14	U	0.16	U	0.14	U	0.16
75-71-8	Dichlorodifluoromethane (CFC 12)	100	2.1	=	2.3	=	2.1	=	2.5	=	2.7
5989-27-5	d-Limonene	-	0.71	U	0.71	U	0.79	U	0.71	U	6.2
64-17-5	Ethanol	-	7.1	U	21	=	20	=	20	=	31
141-78-6	Ethyl Acetate	-	1.4	U	3.8	=	1.9	=	5.6	=	12
100-41-4	Ethylbenzene	0.97	0.71	U	0.71	U	0.79	U	0.89	=	5.5
87-68-3	Hexachlorobutadiene	0.11	0.71	U	0.71	U	0.79	U	0.71	U	0.76
179601-23-1	m,p-Xylenes	100	1.2	=	1.5	=	1.4	=	3.3	=	6.5
80-62-6	Methyl Methacrylate	-	1.4	U	1.4	U	1.6	U	1.4	U	1.5
1634-04-4	Methyl tert-Butyl Ether	9.4	0.14	U	0.14	U	0.16	U	0.14	U	0.15
75-09-2	Methylene Chloride	96	0.83	=	1.5	=	1.2	=	1.1	=	4.1
91-20-3	Naphthalene	0.072	0.71	U	0.71	U	0.79	U	0.71	U	3.0
123-86-4	n-Butyl Acetate	-	0.71	U	0.71	U	0.79	U	0.71	U	1.4
142-82-5	n-Heptane	-	0.71	U	0.89	=	0.79	U	0.71	=	2.90
110-54-3	n-Hexane	730	0.96	=	0.97	=	0.79	=	0.77	=	4.7
111-84-2	n-Nonane	-	0.71	U	0.71	U	0.79	U	0.71	U	5.3
111-65-9	n-Octane	-	0.71	U	0.71	U	0.79	U	0.71	U	3.5
103-65-1	n-Propylbenzene	1,000	0.71	U	0.71	U	0.79	U	0.71	U	0.76
95-47-6	o-Xylene	100	0.71	U	0.71	U	0.79	U	0.73	=	6.5
	Total Xylenes	100	1.2	=	1.5	=	1.4	=	4.03	=	13.00
115-07-1	Propene	-	1.5	=	2.8	=	1.5	=	1.1	=	4.3

Appendix C-1
 Volatile Organic Compounds (VOCs) Analyzed Using EPA Method TC
*July 2012, October 2012, January 2013, and April 2013 Ambient Air at
 Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgeview*

CAS#	Parameter	Sample Location			
		Field Sample ID	PZAA-C4-010913	PZAA-C4-041013	
71-55-6	1,1,1-Trichloroethane	5,200	0.15	U	0.15
79-34-5	1,1,2,2-Tetrachloroethane	0.042	0.15	U	0.15
79-00-5	1,1,2-Trichloroethane	0.15	0.15	U	0.15
75-34-3	1,1-Dichloroethane	1.5	0.15	U	0.15
75-35-4	1,1-Dichloroethene	210	0.15	U	0.15
120-82-1	1,2,4-Trichlorobenzene	2.1	0.75	U	0.76
95-63-6	1,2,4-Trimethylbenzene	7.3	0.75	U	0.76
96-12-8	1,2-Dibromo-3-chloropropane	-	0.75	U	0.76
106-93-4	1,2-Dibromoethane	0.0041	0.15	U	0.15
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	-	0.75	U	0.76
95-50-1	1,2-Dichlorobenzene	210	0.15	U	0.34
107-06-2	1,2-Dichloroethane	0.094	0.15	U	0.15
78-87-5	1,2-Dichloropropane	0.24	0.15	U	0.15
108-67-8	1,3,5-Trimethylbenzene	7.3	0.75	U	0.76
106-99-0	1,3-Butadiene	0.081	0.3	U	0.3
541-73-1	1,3-Dichlorobenzene	210	0.15	U	0.15
106-46-7	1,4-Dichlorobenzene	0.22	0.15	U	0.15
123-91-1	1,4-Dioxane	0.32	0.75	U	0.76
78-93-3	2-Butanone (MEK)	5,200	7.5	U	7.6
591-78-6	2-Hexanone	31	0.75	U	0.76
67-63-0	2-Propanol (Isopropyl Alcohol)	-	7.5	U	7.6
107-05-1	3-Chloro-1-propene (Allyl Chloride)	-	0.15	U	0.15
622-96-8	4-Ethyltoluene	-	0.75	U	0.76
108-10-1	4-Methyl-2-pentanone	3,100	0.75	U	0.76
67-64-1	Acetone	32,000	12	=	15
75-05-8	Acetonitrile	-	0.75	U	2.3
107-02-8	Acrolein	-	3	U	3
107-13-1	Acrylonitrile	-	0.75	U	0.76
80-56-8	alpha-Pinene	-	1.7	=	0.76
71-43-2	Benzene	0.31	3.3	=	6.3
100-44-7	Benzyl Chloride	0.05	0.75	U	0.76
75-27-4	Bromodichloromethane	42	0.15	U	0.15
75-25-2	Bromoform	2.2	0.75	U	0.76
74-83-9	Bromomethane	5.2	0.15	U	0.15
75-15-0	Carbon Disulfide	730	7.5	U	7.6
56-23-5	Carbon Tetrachloride	0.41	0.41	=	0.48
108-90-7	Chlorobenzene	52	0.31	=	0.15
75-00-3	Chloroethane	10,000	0.15	U	0.15
67-66-3	Chloroform	0.11	0.19	=	0.29
74-87-3	Chloromethane	94	0.54	=	0.53
156-59-2	cis-1,2-Dichloroethene	63	0.15	U	0.15
10061-01-5	cis-1,3-Dichloropropene	0.61	0.75	U	0.76
98-82-8	Cumene	1,000	0.75	U	0.76
110-82-7	Cyclohexane	6,300	1.5	U	1.5
124-48-1	Dibromochloromethane	0.09	0.15	U	0.15
75-71-8	Dichlorodifluoromethane (CFC 12)	100	2.1	=	2.3
5989-27-5	d-Limonene	-	0.75	U	ND
64-17-5	Ethanol	-	9.6	=	18
141-78-6	Ethyl Acetate	-	1.5	U	2.1
100-41-4	Ethylbenzene	0.97	0.75	U	0.76
87-68-3	Hexachlorobutadiene	0.11	0.75	U	0.76
179601-23-1	m,p-Xylenes	100	1.3	=	1.6
80-62-6	Methyl Methacrylate	-	1.5	U	1.5
1634-04-4	Methyl tert-Butyl Ether	9.4	0.15	U	0.15
75-09-2	Methylene Chloride	96	0.83	=	1.1
91-20-3	Naphthalene	0.072	0.75	U	0.76
123-86-4	n-Butyl Acetate	-	0.75	U	0.76
142-82-5	n-Heptane	-	0.75	U	0.77
110-54-3	n-Hexane	730	0.96	=	0.89
111-84-2	n-Nonane	-	0.75	U	0.76
111-65-9	n-Octane	-	0.75	U	0.76
103-65-1	n-Propylbenzene	1,000	0.75	U	0.76
95-47-6	o-Xylene	100	0.75	U	0.76
	Total Xylenes	100	1.3	=	1.6
115-07-1	Propene	-	1.4	=	1.4
100-42-5	Styrene	1,000	0.75	U	0.76
127-18-4	Tetrachloroethene	9.4	0.2	=	0.15
109-99-9	Tetrahydrofuran (THF)	-	0.75	U	0.76
108-88-3	Toluene	3,100	2.9	=	6.4
156-60-5	trans-1,2-Dichloroethene	63	0.15	U	0.15
10061-02-6	trans-1,3-Dichloropropene	0.61	0.75	U	0.76
79-01-6	Trichloroethene	0.43	0.15	U	0.15
75-69-4	Trichlorofluoromethane	730	1.5	=	1.2
76-13-1	Trichlorotrifluoroethane	31,000	0.53	=	0.58
108-05-4	Vinyl Acetate	-	7.5	U	7.6
75-01-4	Vinyl Chloride	0.16	0.15	U	0.15

Notes:

µg/m³ = micrograms per cubic meter

Qual = Lab Qualifier

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be measured.

ND = Not Detected

U = Compound was analyzed for, but not detected above the laboratory detection limit.

UJ = Estimated non-detect quantitation as a result of the validation process.

J = Estimated quantitation as a result of the validation process.

M = Matrix interference; results may be biased high.

L = Laboratory control sample recovery outside the specified limits, reanalyzed.

(=) Target compound was detected and confirmed to be present in the sample.

- = Regional Screening Level (RSL) does not exist for this parameter.

Bold indicates a detection.

Yellow highlight = Exceedance of the RSL

RSLs are the residential values published November 2012,

http://www.epa.gov/reg3hwmd/risk/human/rb-concentration_table/Generic.xls

Appendix C-2

Aldehydes (Analyzed Using EPA Method TO-11A) and Polycyclic Aromatic Hydrocarbons (Analyzed Using EPA Method TO-13A)

July 2012, October 2012, January 2013, and April 2013 Ambient Air Monitoring Events

Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgewater, New Jersey

CAS#	Parameter	Method	Regional Screening Level µg/m³	PZAA-C1								
				PZAA-C1-072012			PZAA-C1-102412			PZAA-C1-010913		
				Field Sample ID		Sample Date	Regular		Regular		Regular	
				µg/m³			µg/m³		µg/m³		µg/m³	
5779-94-2	2,5-Demethylbenzaldehyde	TO-11A	—	0.12	0.055	=	0.061	0.058	=	0.14	0.14	U
529-20-4	2-Methylbenzaldehyde	TO-11A	—	ND	0.055	U	ND	0.058	U	0.14	0.14	U
NA	3-Methylbenzaldehyde + 4-Methylbenzaldehyde	TO-11A	—	ND	0.11	U	ND	0.12	U	0.28	0.28	U
590-86-3	3-Methylbutyraldehyde	TO-11A	—	ND	0.055	U	ND	0.058	U	0.14	0.14	U
75-07-0	Acetaldehyde	TO-11A	1.1	2.8	0.055	=	1.4	0.058	BT	6.9	0.14	BH, BC
100-52-7	Benzaldehyde	TO-11A	—	0.06	0.055	=	0.074	0.058	=	ND	0.14	U
123-72-8	Butyraldehyde	TO-11A	—	ND	0.055	U	ND	0.058	U	ND	0.14	U
4170-30-3	Crotonaldehyde	TO-11A	—	ND	0.055	U	ND	0.058	U	ND	0.14	U
50-00-0	Formaldehyde	TO-11A	0.19	1.1	0.055	=	1.1	0.058	M	13	0.14	BT, M, BC
66-25-1	Hexanal	TO-11A	—	ND	0.055	U	0.058	0.058	=	ND	0.14	U
123-38-6	n-Propanal	TO-11A	8.3	ND	0.055	U	ND	0.058	U	ND	0.14	U
110-62-3	Valeraldehyde	TO-11A	—	0.09	0.055	=	ND	0.058	U	ND	0.14	U
83-32-9	Acenaphthene	TO-13A	—	ND	0.28	U	ND	0.067	U	0.069	0.069	U
208-96-8	Acenaphthylene	TO-13A	—	ND	0.28	U	ND	0.067	UJ	0.069	0.069	UJ
120-12-7	Anthracene	TO-13A	—	ND	0.28	U	ND	0.067	U	ND	0.069	U
56-55-3	Benzo(a)anthracene	TO-13A	0.0087	ND	0.28	U	ND	0.067	U	ND	0.069	U
50-32-8	Benzo(a)pyrene	TO-13A	0.00087	ND	0.28	U	ND	0.067	U	ND	0.069	U
205-99-2	Benzo(b)fluoranthene	TO-13A	0.0087	ND	0.28	U	ND	0.067	U	ND	0.069	U
191-24-2	Benzo(g,h,i)perylene	TO-13A	—	ND	0.28	U	ND	0.067	U	ND	0.069	U
207-08-9	Benzo(k)fluoranthene	TO-13A	0.0087	ND	0.28	U	ND	0.067	U	ND	0.069	U
218-01-9	Chrysene	TO-13A	0.087	ND	0.28	U	ND	0.067	U	ND	0.069	U
53-70-3	Dibenz(a,h)anthracene	TO-13A	0.0008	ND	0.28	U	ND	0.067	U	ND	0.069	U
206-44-0	Fluoranthene	TO-13A	—	ND	0.28	U	ND	0.067	U	ND	0.069	U
86-73-7	Fluorene	TO-13A	—	ND	0.28	U	ND	0.067	U	ND	0.069	U
193-39-5	Indeno(1,2,3-c,d)pyrene	TO-13A	0.0087	ND	0.28	U	ND	0.067	U	ND	0.069	U
91-20-3	Naphthalene	TO-13A	0.072	ND	2.8	U	ND	0.67	UJ	ND	0.69	U
85-01-8	Phenanthrene	TO-13A	—	ND	0.28	U	ND	0.067	U	ND	0.069	U
129-00-0	Pyrene	TO-13A	—	ND	0.28	U	ND	0.067	U	ND	0.069	U

Notes:

µg/m³ = micrograms per cubic meter

Qual = Lab Qualifier

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

ND = Not Detected

U = Compound was analyzed for, but not detected above the laboratory reporting limit.

UJ = Estimated non-detect quantitation as a result of the validation process

BC = Results reported are not blank corrected.

BH = Results indicate breakthrough; back section of tube greater than front section

BT = Results indicated possible breakthrough; back section > 10% of front section.

J = Estimated quantitation as a result of the validation process

M = Matrix interference; results may be biased high.

L = Laboratory control sample recovery outside the specified limits, results may be biased low.

N/A = Not Applicable

NA = Not Analyzed

(=) Target compound was detected and confirmed to be present in the sample matrix per the analytical method

— = Regional Screening Level (RSL) does not exist for this parameter.

Bold indicates a detection.

Yellow highlight = Exceedance of the RSL

RSLs are the residential values published November 2012,

http://www.epa.gov/req3hwmd/risk/human/rb-concentration_table/Generic_Tables/pdf/resair_sl_table_run_NOV2012.pdf

Appendix C-2

Aldehydes (Analyzed Using EPA Method TO-11A) and Polycyclic Aromatic Hydrocarbons (Anal
July 2012, October 2012, January 2013, and April 2013 Ambient Air Monitoring Events
Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgewater, New Jersey

CAS#	Parameter	Method	Regional Screening Level µg/m³	Sample Location								
				Field Sample ID			PZAA-C1-041013			PZAA-C2-072012		
				Sample Date			4/10/2013			10/24/2012		
				Sample Type Units			Regular			Regular		
			µg/m³				µg/m³			µg/m³		
5779-94-2	2,5-Demethylbenzaldehyde	TO-11A	—	0.11	0.11	U, BC	0.16	0.055	=	ND	0.056	U
529-20-4	2-Methylbenzaldehyde	TO-11A	—	0.11	0.11	U, BC	0.055	0.055	U	ND	0.056	U
NA	3-Methylbenzaldehyde + 4-Methylbenzaldehyde	TO-11A	—	0.23	0.23	U, BC	0.11	0.11	U	ND	0.11	U
590-86-3	3-Methylbutyraldehyde	TO-11A	—	0.11	0.11	U, BC	0.055	0.055	U	ND	0.056	U
75-07-0	Acetaldehyde	TO-11A	1.1	7.4	0.11	J, BT, BC	2.2	0.055	=	1	0.056	BT
100-52-7	Benzaldehyde	TO-11A	—	0.12	0.11	BC	ND	0.055	U	ND	0.056	U
123-72-8	Butyraldehyde	TO-11A	—	ND	0.11	U, BC	ND	0.055	U	ND	0.056	U
4170-30-3	Crotonaldehyde	TO-11A	—	ND	0.11	U, BC	ND	0.055	U	ND	0.056	U
50-00-0	Formaldehyde	TO-11A	0.19	1.6	0.11	J, BT, BC	2.6	0.055	=	0.38	0.056	=
66-25-1	Hexanal	TO-11A	—	0.58	0.11	BC	ND	0.055	U	ND	0.056	U
123-38-6	n-Propanal	TO-11A	8.3	ND	0.11	U, BC	ND	0.055	U	ND	0.056	U
110-62-3	Valeraldehyde	TO-11A	—	0.3	0.11	BC	0.14	0.055	=	ND	0.056	U
83-32-9	Acenaphthene	TO-13A	—	0.07	0.07	U	0.27	0.27	U	ND	0.068	UJ
208-96-8	Acenaphthylene	TO-13A	—	0.07	0.07	UJ, L	0.27	0.27	U	ND	0.068	UJ
120-12-7	Anthracene	TO-13A	—	ND	0.07	U	ND	0.27	U	ND	0.068	UJ
56-55-3	Benzo(a)anthracene	TO-13A	0.0087	ND	0.07	U	ND	0.27	U	ND	0.068	UJ
50-32-8	Benzo(a)pyrene	TO-13A	0.00087	ND	0.07	U	ND	0.27	U	ND	0.068	UJ
205-99-2	Benzo(b)fluoranthene	TO-13A	0.0087	ND	0.07	U	ND	0.27	U	ND	0.068	UJ
191-24-2	Benzo(g,h,i)perylene	TO-13A	—	ND	0.07	U	ND	0.27	U	ND	0.068	UJ
207-08-9	Benzo(k)fluoranthene	TO-13A	0.0087	ND	0.07	U	ND	0.27	U	ND	0.068	UJ
218-01-9	Chrysene	TO-13A	0.087	ND	0.07	U	ND	0.27	U	ND	0.068	UJ
53-70-3	Dibenz(a,h)anthracene	TO-13A	0.0008	ND	0.07	U	ND	0.27	U	ND	0.068	UJ
206-44-0	Fluoranthene	TO-13A	—	ND	0.07	U	ND	0.27	U	ND	0.068	UJ
86-73-7	Fluorene	TO-13A	—	ND	0.07	U	ND	0.27	U	ND	0.068	UJ
193-39-5	Indeno(1,2,3-c,d)pyrene	TO-13A	0.0087	ND	0.07	U	ND	0.27	U	ND	0.068	UJ
91-20-3	Naphthalene	TO-13A	0.072	ND	0.7	U	ND	2.7	U	ND	0.68	UJ
85-01-8	Phenanthrene	TO-13A	—	ND	0.07	U	ND	0.27	U	ND	0.068	UJ
129-00-0	Pyrene	TO-13A	—	ND	0.07	U	ND	0.27	U	ND	0.068	UJ

Notes:

µg/m³ = micrograms per cubic meter

Qual = Lab Qualifier

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http://www.epa.gov/req3hwmd/risk/human/rb-concentration_table/Generic_Tables/pdf/resair_sl_table

Appendix C-2

Aldehydes (Analyzed Using EPA Method TO-11A) and Polycyclic Aromatic Hydrocarbons (Anal
July 2012, October 2012, January 2013, and April 2013 Ambient Air Monitoring Events
Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgewater, New Jersey

CAS#	Parameter	Method	Regional Screening Level µg/m³	Sample Location PZAA-C2					
				Field Sample ID		PZAA-C2-010913	PZAA-C2-041013		PZAA-C3-072012
				Sample Date		1/9/2013	4/10/2013		7/20/
				Sample Type		Regular	Regular		Regular
				Units		µg/m³	µg/m³		µg/m³
5779-94-2	2,5-Demethylbenzaldehyde	TO-11A	—	ND	0.14	U	ND	0.12	U, BC
529-20-4	2-Methylbenzaldehyde	TO-11A	—	ND	0.14	U	ND	0.12	U, BC
NA	3-Methylbenzaldehyde + 4-Methylbenzaldehyde	TO-11A	—	ND	0.28	U	ND	0.23	U, BC
590-86-3	3-Methylbutyraldehyde	TO-11A	—	ND	0.14	U	ND	0.12	U, BC
75-07-0	Acetaldehyde	TO-11A	1.1	6.4	0.14	BT, BC	6	0.12	J, BT, BC
100-52-7	Benzaldehyde	TO-11A	—	ND	0.14	U	0.17	0.12	BC
123-72-8	Butyraldehyde	TO-11A	—	ND	0.14	U	0.24	0.12	J, M, BC
4170-30-3	Crotonaldehyde	TO-11A	—	ND	0.14	U	ND	0.12	U, BC
50-00-0	Formaldehyde	TO-11A	0.19	7.4	0.14	BT, M, BC	2.3	0.12	J, BT, BC
66-25-1	Hexanal	TO-11A	—	ND	0.14	U	0.61	0.12	BC
123-38-6	n-Propanal	TO-11A	8.3	ND	0.14	U	ND	0.12	U, BC
110-62-3	Valeraldehyde	TO-11A	—	ND	0.14	U	0.38	0.12	BC
83-32-9	Acenaphthene	TO-13A	—	ND	0.069	U	ND	0.068	U
208-96-8	Acenaphthylene	TO-13A	—	ND	0.069	UJ	ND	0.068	UJ, L
120-12-7	Anthracene	TO-13A	—	ND	0.069	U	ND	0.068	U
56-55-3	Benzo(a)anthracene	TO-13A	0.0087	ND	0.069	U	ND	0.068	U
50-32-8	Benzo(a)pyrene	TO-13A	0.00087	ND	0.069	U	ND	0.068	U
205-99-2	Benzo(b)fluoranthene	TO-13A	0.0087	ND	0.069	U	ND	0.068	U
191-24-2	Benzo(g,h,i)perylene	TO-13A	—	ND	0.069	U	ND	0.068	U
207-08-9	Benzo(k)fluoranthene	TO-13A	0.0087	ND	0.069	U	ND	0.068	U
218-01-9	Chrysene	TO-13A	0.087	ND	0.069	U	ND	0.068	U
53-70-3	Dibenz(a,h)anthracene	TO-13A	0.0008	ND	0.069	U	ND	0.068	U
206-44-0	Fluoranthene	TO-13A	—	ND	0.069	U	ND	0.068	U
86-73-7	Fluorene	TO-13A	—	ND	0.069	U	ND	0.068	U
193-39-5	Indeno(1,2,3-c,d)pyrene	TO-13A	0.0087	ND	0.069	U	ND	0.068	U
91-20-3	Naphthalene	TO-13A	0.072	ND	0.69	U	ND	0.68	U
85-01-8	Phenanthrene	TO-13A	—	ND	0.069	U	ND	0.068	U
129-00-0	Pyrene	TO-13A	—	ND	0.069	U	ND	0.068	U

Notes:

µg/m³ = micrograms per cubic meter

Qual = Lab Qualifier

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ND = Not Detected

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http://www.epa.gov/req3hwmd/risk/human/rb-concentration_table/Generic_Tables/pdf/resair_sl_table

Appendix C-2

Aldehydes (Analyzed Using EPA Method TO-11A) and Polycyclic Aromatic Hydrocarbons (Anal
July 2012, October 2012, January 2013, and April 2013 Ambient Air Monitoring Events
Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgewater, New Jersey

CAS#	Parameter	Method	Regional Screening Level µg/m³	Sample Location			PZAA-C					
				Field Sample ID PZAA-C3-072012-D			PZAA-C3-102412					
				Sample Date 2012			10/24/2012					
				Duplicate	Regular		Duplicate					
			µg/m³		µg/m³		µg/m³					
5779-94-2	2,5-Demethylbenzaldehyde	TO-11A	—	NA			ND	0.055	U	ND	0.055	U
529-20-4	2-Methylbenzaldehyde	TO-11A	—	NA			ND	0.055	U	ND	0.055	U
NA	3-Methylbenzaldehyde + 4-Methylbenzaldehyde	TO-11A	—	NA			ND	0.11	U	ND	0.11	U
590-86-3	3-Methylbutyraldehyde	TO-11A	—	NA			ND	0.055	U	ND	0.055	U
75-07-0	Acetaldehyde	TO-11A	1.1	NA			0.86	0.055	BT	1.4	0.055	BT
100-52-7	Benzaldehyde	TO-11A	—	NA			ND	0.055	U	ND	0.055	U
123-72-8	Butyraldehyde	TO-11A	—	NA			ND	0.055	U	ND	0.055	U
4170-30-3	Crotonaldehyde	TO-11A	—	NA			ND	0.055	U	ND	0.055	U
50-00-0	Formaldehyde	TO-11A	0.19	NA			0.54	0.055	BT	ND	0.055	U
66-25-1	Hexanal	TO-11A	—	NA			ND	0.055	U	ND	0.055	U
123-38-6	n-Propanal	TO-11A	8.3	NA			ND	0.055	U	ND	0.055	U
110-62-3	Valeraldehyde	TO-11A	—	NA			ND	0.055	U	ND	0.055	U
83-32-9	Acenaphthene	TO-13A	—	ND	0.33	U	ND	0.067	U	NA		
208-96-8	Acenaphthylene	TO-13A	—	ND	0.33	U	ND	0.067	UJ	NA		
120-12-7	Anthracene	TO-13A	—	ND	0.33	U	ND	0.067	U	NA		
56-55-3	Benzo(a)anthracene	TO-13A	0.0087	ND	0.33	U	ND	0.067	U	NA		
50-32-8	Benzo(a)pyrene	TO-13A	0.00087	ND	0.33	U	ND	0.067	U	NA		
205-99-2	Benzo(b)fluoranthene	TO-13A	0.0087	ND	0.33	U	ND	0.067	U	NA		
191-24-2	Benzo(g,h,i)perylene	TO-13A	—	ND	0.33	U	ND	0.067	U	NA		
207-08-9	Benzo(k)fluoranthene	TO-13A	0.0087	ND	0.33	U	ND	0.067	U	NA		
218-01-9	Chrysene	TO-13A	0.087	ND	0.33	U	ND	0.067	U	NA		
53-70-3	Dibenz(a,h)anthracene	TO-13A	0.0008	ND	0.33	U	ND	0.067	U	NA		
206-44-0	Fluoranthene	TO-13A	—	ND	0.33	U	ND	0.067	U	NA		
86-73-7	Fluorene	TO-13A	—	ND	0.33	U	ND	0.067	U	NA		
193-39-5	Indeno(1,2,3-c,d)pyrene	TO-13A	0.0087	ND	0.33	U	ND	0.067	U	NA		
91-20-3	Naphthalene	TO-13A	0.072	ND	3.3	U	ND	0.67	UJ	NA		
85-01-8	Phenanthrene	TO-13A	—	ND	0.33	U	ND	0.067	U	NA		
129-00-0	Pyrene	TO-13A	—	ND	0.33	U	ND	0.067	U	NA		

Notes:

µg/m³ = micrograms per cubic meter

Qual = Lab Qualifier

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confident

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http://www.epa.gov/req3hwmd/risk/human/rb-concentration_table/Generic_Tables/pdf/resair_sl_table

Appendix C-2

Aldehydes (Analyzed Using EPA Method TO-11A) and Polycyclic Aromatic Hydrocarbons (Anal
July 2012, October 2012, January 2013, and April 2013 Ambient Air Monitoring Events
Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgewater, New Jersey

CAS#	Parameter	Method	Regional Screening Level µg/m³	Sample Location 3								
				Field Sample ID PZAA-C3-010913			PZAA-C3-041013			PZAA-C3-041013-D		
				Sample Date 1/9/2013				4/10/2013				
				Sample Type Regular		Regular		Field Duplicate				
				Units µg/m³		µg/m³		µg/m³				
5779-94-2	2,5-Demethylbenzaldehyde	TO-11A	—	ND	0.069	U	ND	0.057	U, BC	ND	0.057	U, BC
529-20-4	2-Methylbenzaldehyde	TO-11A	—	ND	0.069	U	0.096	0.057	BC	ND	0.057	U, BC
NA	3-Methylbenzaldehyde + 4-Methylbenzaldehyde	TO-11A	—	ND	0.14	U	ND	0.11	U, BC	ND	0.11	U, BC
590-86-3	3-Methylbutyraldehyde	TO-11A	—	ND	0.069	U	ND	0.057	U, BC	ND	0.057	U, BC
75-07-0	Acetaldehyde	TO-11A	1.1	1.9	0.069	BT, BC	1.4	0.057	J, BT, BC	3.5	0.057	J, BT, BC
100-52-7	Benzaldehyde	TO-11A	—	ND	0.069	U	0.087	0.057	BC	0.072	0.057	BC
123-72-8	Butyraldehyde	TO-11A	—	ND	0.069	U	0.11	0.057	BC	ND	0.057	U, BC
4170-30-3	Crotonaldehyde	TO-11A	—	ND	0.069	U	ND	0.057	U, BC	ND	0.057	U, BC
50-00-0	Formaldehyde	TO-11A	0.19	3	0.069	BT, M, BC	1.5	0.057	J, BC	1.3	0.057	J, BT, BC
66-25-1	Hexanal	TO-11A	—	ND	0.069	U	0.52	0.057	BC	0.44	0.057	BC
123-38-6	n-Propanal	TO-11A	8.3	ND	0.069	U	ND	0.057	U, BC	ND	0.057	U, BC
110-62-3	Valeraldehyde	TO-11A	—	ND	0.069	U	0.12	0.057	BC	ND	0.057	U, BC
83-32-9	Acenaphthene	TO-13A	—	ND	0.069	U	ND	0.069	U	ND	0.069	U
208-96-8	Acenaphthylene	TO-13A	—	ND	0.069	UJ	ND	0.069	UJ, L	ND	0.069	UJ, L
120-12-7	Anthracene	TO-13A	—	ND	0.069	U	ND	0.069	U	ND	0.069	U
56-55-3	Benzo(a)anthracene	TO-13A	0.0087	ND	0.069	U	ND	0.069	U	ND	0.069	U
50-32-8	Benzo(a)pyrene	TO-13A	0.00087	ND	0.069	U	ND	0.069	U	ND	0.069	U
205-99-2	Benzo(b)fluoranthene	TO-13A	0.0087	ND	0.069	U	ND	0.069	U	ND	0.069	U
191-24-2	Benzo(g,h,i)perylene	TO-13A	—	ND	0.069	U	ND	0.069	U	ND	0.069	U
207-08-9	Benzo(k)fluoranthene	TO-13A	0.0087	ND	0.069	U	ND	0.069	U	ND	0.069	U
218-01-9	Chrysene	TO-13A	0.087	ND	0.069	U	ND	0.069	U	ND	0.069	U
53-70-3	Dibenz(a,h)anthracene	TO-13A	0.0008	ND	0.069	U	ND	0.069	U	ND	0.069	U
206-44-0	Fluoranthene	TO-13A	—	ND	0.069	U	ND	0.069	U	ND	0.069	U
86-73-7	Fluorene	TO-13A	—	ND	0.069	U	ND	0.069	U	ND	0.069	U
193-39-5	Indeno(1,2,3-c,d)pyrene	TO-13A	0.0087	ND	0.069	U	ND	0.069	U	ND	0.069	U
91-20-3	Naphthalene	TO-13A	0.072	ND	0.69	U	ND	0.69	U	ND	0.69	U
85-01-8	Phenanthrene	TO-13A	—	ND	0.069	U	ND	0.069	U	ND	0.069	U
129-00-0	Pyrene	TO-13A	—	ND	0.069	U	ND	0.069	U	ND	0.069	U

Notes:

µg/m³ = micrograms per cubic meter

Qual = Lab Qualifier

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confident

ND = Not Detected

U = Compound was analyzed for, but not detected above the laboratory reporting limit.

UJ = Estimated non-detect quantitation as a result of the validation process

BC = Results reported are not blank corrected.

BH = Results indicate breakthrough; back section of tube greater than front section

BT = Results indicated possible breakthrough; back section > 10% of front section.

J = Estimated quantitation as a result of the validation process

M = Matrix interference; results may be biased high.

L = Laboratory control sample recovery outside the specified limits, results may be biased low.

N/A = Not Applicable

NA = Not Analyzed

(=) Target compound was detected and confirmed to be present in the sample matrix per the an

- = Regional Screening Level (RSL) does not exist for this parameter.

Bold indicates a detection.

Yellow highlight = Exceedance of the RSL

RSLs are the residential values published November 2012,

http://www.epa.gov/req3hwmd/risk/human/rb-concentration_table/Generic_Tables/pdf/resair_sl_table

Appendix C-3

Reduced Sulfur Compounds Analyzed Using Method ASTM D 5504-08

July 2012, October 2012, January 2013, and April 2013 Ambient Air Monitoring Events

Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgewater, New Jersey

Sample Location Field Sample ID Sample Date Sample Type Units			PZAA-C1																				
			PZAA-C1a-072012			PZAA-C1b-072012			PZAA-C1c-072012			PZAA-C1a-102412			PZAA-C1b-102412			PZAA-C1c-102412			PZAA-C1d-102412		
			7/19/2012									10/24/2012											
			Regular			Regular			Regular			Regular			Regular			Regular			Regular		
CAS	Parameter	Regional Screening Level μg/m ³	μg/m ³																				
			Result	MRL	Qual																		
638-02-8	2,5-Dimethylthiophene	–	ND	23	U																		
872-55-9	2-Ethylthiophene	–	ND	23	U																		
616-44-4	3-Methylthiophene	–	ND	20	U																		
75-15-0	Carbon Disulfide	730	ND	7.8	U																		
463-58-1	Carbonyl Sulfide	–	ND	12	U																		
110-81-6	Diethyl Disulfide	–	ND	12	U																		
352-93-2	Diethyl Sulfide	–	ND	18	U																		
75-18-3	Dimethyl Sulfide	–	ND	13	U																		
75-08-1	Ethyl Mercaptan	–	ND	13	U																		
624-89-5	Ethyl Methyl Sulfide	–	ND	16	U																		
7783-06-4	Hydrogen Sulfide	2.1	ND	7	U	ND	23	=															
513-44-0	Isobutyl Mercaptan	–	ND	18	U																		
75-33-2	Isopropyl Mercaptan	–	ND	16	U																		
624-92-0	Methyl Disulfide	–	ND	9.6	U																		
74-93-1	Methyl Mercaptan	–	ND	9.8	U																		
109-79-5	n-Butyl Mercaptan	–	ND	18	U																		
107-03-9	n-Propyl Mercaptan	–	ND	16	U																		
75-66-1	tert-Butyl Mercaptan	–	ND	18	U																		
110-01-0	Tetrahydrothiophene	–	ND	18	U																		
110-02-1	Thiophene	–	ND	17	U																		

Notes:

μg/m³ = micrograms per cubic meter

Qual = Lab Qualifier

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

U = Compound was analyzed for, but not detected above the laboratory reporting limit.

UJ = Estimated non-detect quantitation as a result of the validation process.

ND = Not Detected

(=) Target compound was detected and confirmed to be present in the sample matrix per the analytical method

– = Regional Screening Level (RSL) does not exist for this parameter.

Yellow highlight signifies the exceedance of the RSL

RSLs are the residential values published November 2012,

http://www.epa.gov/reg3hwmd/risk/human/rb-concentration_table/Generic_Tables/pdf/resair_sl_table_run_NOV2012.pdf

Appendix C-3

Reduced Sulfur Compounds Analyzed Using Method ASTM D 5504-08
*July 2012, October 2012, January 2013, and April 2013 Ambient Air Monitor.
 Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgewater, N*

Sample Location		Field Sample ID																Sample Date																																	
		PZAA-C1b-010813				PZAA-C1c-010813				PZAA-C1a-041113				PZAA-C1b-041113				PZAA-C2a-072012				PZAA-C2b-072012				PZAA-C2c-072012				PZAA-C2a-102412																					
		Sample Date		1/8/2013								4/11/2013								7/19/2012																															
		Sample Type		Regular								Regular								Regular								Regular																							
CAS	Parameter	Regional Screening Level		μg/m ³		μg/m ³		μg/m ³		μg/m ³		μg/m ³		μg/m ³		μg/m ³		μg/m ³		μg/m ³		μg/m ³		μg/m ³		μg/m ³		μg/m ³		μg/m ³		μg/m ³																			
				Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual																		
638-02-8	2,5-Dimethylthiophene	-		ND	23	U	ND	23	U	ND	23	U	ND	23	U	ND	23	U	ND	23	U	ND	23	U	ND	23	U	ND	23	U	ND	23	U																		
872-55-9	2-Ethylthiophene	-		ND	23	U	ND	23	U	ND	23	U	ND	23	U	ND	23	U	ND	23	U	ND	23	U	ND	23	U	ND	23	U	ND	23	U																		
616-44-4	3-Methylthiophene	-		ND	20	U	ND	20	U	ND	20	U	ND	20	U	ND	20	U	ND	20	U	ND	20	U	ND	20	U	ND	20	U	ND	20	U																		
75-15-0	Carbon Disulfide	730		ND	7.8	U	ND	7.8	U	ND	7.8	U	ND	7.8	U	ND	7.8	U	ND	7.8	U	ND	7.8	U	ND	7.8	U	ND	7.8	U	ND	7.8	U																		
463-58-1	Carbonyl Sulfide	-		ND	12	U	ND	12	U	ND	12	U	ND	12	U	ND	12	U	ND	12	U	ND	12	U	ND	12	U	ND	12	U	ND	12	U																		
110-81-6	Diethyl Disulfide	-		ND	12	U	ND	12	U	ND	12	U	ND	12	U	ND	12	U	ND	12	U	ND	12	U	ND	12	U	ND	12	U	ND	12	U																		
352-93-2	Diethyl Sulfide	-		ND	18	U	ND	18	U	ND	18	U	ND	18	U	ND	18	U	ND	18	U	ND	18	U	ND	18	U	ND	18	U	ND	18	U																		
75-18-3	Dimethyl Sulfide	-		ND	13	U	ND	13	U	ND	13	U	ND	13	U	ND	13	U	ND	13	U	ND	13	U	ND	13	U	ND	13	U	ND	13	U																		
75-08-1	Ethyl Mercaptan	-		ND	13	U	ND	13	U	ND	13	U	ND	13	U	ND	13	U	ND	13	U	ND	13	U	ND	13	U	ND	13	U	ND	13	U																		
624-89-5	Ethyl Methyl Sulfide	-		ND	16	U	ND	16	U	ND	16	U	ND	16	U	ND	16	U	ND	16	U	ND	16	U	ND	16	U	ND	16	U	ND	16	U																		
7783-06-4	Hydrogen Sulfide	2.1		ND	7	U	ND	7	U	ND	7	U	ND	7	U	ND	7	U	ND	7	U	ND	7	U	ND	7	U	ND	7	U	ND	7	U																		
513-44-0	Isobutyl Mercaptan	-		ND	18	U	ND	18	U	ND	18	U	ND	18	U	ND	18	U	ND	18	U	ND	18	U	ND	18	U	ND	18	U	ND	18	U																		
75-33-2	Isopropyl Mercaptan	-		ND	16	U	ND	16	U	ND	16	U	ND	16	U	ND	16	U	ND	16	U	ND	16	U	ND	16	U	ND	16	U	ND	16	U																		
624-92-0	Methyl Disulfide	-		ND	9.6	U	ND	9.6	U	ND	9.6	U	ND	9.6	U	ND	9.6	U	ND	9.6	U	ND	9.6	U	ND	9.6	U	ND	9.6	U	ND	9.6	U																		
74-93-1	Methyl Mercaptan	-		ND	9.8	U	ND	9.8	U	ND	9.8	U	ND	9.8	U	ND	9.8	U	ND	9.8	U	ND	9.8	U	ND	9.8	U	ND	9.8	U	ND	9.8	U																		
109-79-5	n-Butyl Mercaptan	-		ND	18	U	ND	18	U	ND	18	U	ND	18	U	ND	18	U	ND	18	U	ND	18	U	ND	18	U	ND	18	U	ND	18	U																		
107-03-9	n-Propyl Mercaptan	-		ND	16	U	ND	16	U	ND	16	U	ND	16	U	ND	16	U	ND	16	U	ND	16	U	ND	16	U	ND	16	U	ND	16	U																		
75-66-1	tert-Butyl Mercaptan	-		ND	18	U	ND	18	U	ND	18	U	ND	18	U	ND	18	U	ND	18	U	ND	18	U	ND	18	U	ND	18	U	ND	18	U																		
110-01-0	Tetrahydrothiophene	-		ND	18	U	ND	18	U	ND	18	U	ND	18	U	ND	18	U	ND	18	U	ND	18	U	ND	18	U	ND	18	U	ND	18	U																		
110-02-1	Thiophene	-		ND	17	U	ND	17	U	ND	17	U	ND	17	U	ND	17	U	ND	17	U	ND	17	U	ND	17	U	ND	17	U	ND	17	U																		

Notes:

Appendix C-3

Reduced Sulfur Compounds Analyzed Using Method ASTM D 5504-08

July 2012, October 2012, January 2013, and April 2013 Ambient Air Monitor

Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgewater, N

Notes:

$\mu\text{g}/\text{m}^3$ = micrograms per cubic meter

Qual = Lab Qualifier

MRL = Method Reporting Limit - The minimum quantity of a target analyte that

U = Compound was analyzed for, but not detected above the laboratory repo

UJ = Estimated non-detect quantitation as a result of the validation process.

ND = Not Detected

(=) Target compound was detected and confirmed to be present in the sample

- = Regional Screening Level (RSL) does not exist for this parameter.

Yellow highlight signifies the exceedance of the RSI

BSI s are the residential values published November 2012

PRCS are the residential values published November 2012, http://www.epa.gov/reg3hwmd/risk/human/rb-concentration_table.html

<http://www.epa.gov/regulations/riskyhuman/pbconcentration-table/general-tables/pbconcentration-table.html>

Appendix C-3

Reduced Sulfur Compounds Analyzed Using Method ASTM D 5504-08

July 2012, October 2012, January 2013, and April 2013 Ambient Air Monitor.

Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgewater, N

CAS	Parameter	Sample Location			PZAA-C3																			
					Field Sample ID			PZAA-C3a-072012		PZAA-C3b-072012		PZAA-C3c-072012		PZAA-C3a-102412		PZAA-C3b-102412		PZAA-C3c-102412		PZAA-C3d-102412				
		Sample Date			7/19/2012								10/24/2012											
		Sample Type	Regular			Regular			Regular			Regular			Regular			Regular						
			µg/m³			µg/m³			µg/m³			µg/m³			µg/m³			µg/m³						
		Regional Screening Level			µg/m³			Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual		
638-02-8	2,5-Dimethylthiophene	–	ND	23	U	ND	23	U	ND	23	U	ND	23	U	ND	23	UJ	ND	23	UJ	ND	23	UJ	
872-55-9	2-Ethylthiophene	–	ND	23	U	ND	23	U	ND	23	U	ND	23	U	ND	23	UJ	ND	23	UJ	ND	23	UJ	
616-44-4	3-Methylthiophene	–	ND	20	U	ND	20	U	ND	20	U	ND	20	U	ND	20	UJ	ND	20	UJ	ND	20	UJ	
75-15-0	Carbon Disulfide	730	ND	7.8	U	ND	7.8	U	ND	7.8	U	ND	7.8	U	ND	7.8	UJ	ND	7.8	UJ	ND	7.8	UJ	
463-58-1	Carbonyl Sulfide	–	ND	12	U	ND	12	U	ND	12	U	ND	12	U	ND	12	UJ	ND	12	UJ	ND	12	UJ	
110-81-6	Diethyl Disulfide	–	ND	12	U	ND	12	U	ND	12	U	ND	12	U	ND	12	UJ	ND	12	UJ	ND	12	UJ	
352-93-2	Diethyl Sulfide	–	ND	18	U	ND	18	U	ND	18	U	ND	18	U	ND	18	UJ	ND	18	UJ	ND	18	UJ	
75-18-3	Dimethyl Sulfide	–	ND	13	U	ND	13	U	ND	13	U	ND	13	U	ND	13	UJ	ND	13	UJ	ND	13	UJ	
75-08-1	Ethyl Mercaptan	–	ND	13	U	ND	13	U	ND	13	U	ND	13	U	ND	13	UJ	ND	13	UJ	ND	13	UJ	
624-89-5	Ethyl Methyl Sulfide	–	ND	16	U	ND	16	U	ND	16	U	ND	16	U	ND	16	UJ	ND	16	UJ	ND	16	UJ	
7783-06-4	Hydrogen Sulfide	2.1	ND	7	U	ND	7	U	ND	7	U	ND	7	U	ND	7	UJ	ND	7	UJ	ND	7	UJ	
513-44-0	Isobutyl Mercaptan	–	ND	18	U	ND	18	U	ND	18	U	ND	18	U	ND	18	UJ	ND	18	UJ	ND	18	UJ	
75-33-2	Isopropyl Mercaptan	–	ND	16	U	ND	16	U	ND	16	U	ND	16	U	ND	16	UJ	ND	16	UJ	ND	16	UJ	
624-92-0	Methyl Disulfide	–	ND	9.6	U	ND	9.6	U	ND	9.6	U	ND	9.6	U	ND	9.6	UJ	ND	9.6	UJ	ND	9.6	UJ	
74-93-1	Methyl Mercaptan	–	ND	9.8	U	ND	9.8	U	ND	9.8	U	ND	9.8	U	ND	9.8	UJ	ND	9.8	UJ	ND	9.8	UJ	
109-79-5	n-Butyl Mercaptan	–	ND	18	U	ND	18	U	ND	18	U	ND	18	U	ND	18	UJ	ND	18	UJ	ND	18	UJ	
107-03-9	n-Propyl Mercaptan	–	ND	16	U	ND	16	U	ND	16	U	ND	16	U	ND	16	UJ	ND	16	UJ	ND	16	UJ	
75-66-1	tert-Butyl Mercaptan	–	ND	18	U	ND	18	U	ND	18	U	ND	18	U	ND	18	UJ	ND	18	UJ	ND	18	UJ	
110-01-0	Tetrahydrothiophene	–	ND	18	U	ND	18	U	ND	18	U	ND	18	U	ND	18	UJ	ND	18	UJ	ND	18	UJ	
110-02-1	Thiophene	–	ND	17	U	ND	17	U	ND	17	U	ND	17	U	ND	17	UJ	ND	17	UJ	ND	17	UJ	

Notes:

µg/m³ = micrograms per cubic meter

Qual = Lab Qualifier

MRL = Method Reporting Limit - The minimum quantity of a target analyte that

U = Compound was analyzed for, but not detected above the laboratory reporting limit

UJ = Estimated non-detect quantitation as a result of the validation process.

ND = Not Detected

(=) Target compound was detected and confirmed to be present in the sample

– = Regional Screening Level (RSL) does not exist for this parameter.

Yellow highlight signifies the exceedance of the RSL

RSLs are the residential values published November 2012,

http://www.epa.gov/reg3hwmd/risk/human/rb-concentration_table/Generic_Tables/pd

Appendix C-3

Reduced Sulfur Compounds Analyzed Using Method ASTM D 5504-08
*July 2012, October 2012, January 2013, and April 2013 Ambient Air Monitor.
 Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgewater, N*

CAS	Parameter	Sample Location		Field Sample ID			PZAA-C3a-010813			PZAA-C3b-010813			PZAA-C3c-010813		
		Regional Screening Level	Sample Type	Sample Date		1/8/2013			Regular			Regular			
				Units		μg/m³			μg/m³			μg/m³			
				Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual
				μg/m³			μg/m³			μg/m³			μg/m³		
638-02-8	2,5-Dimethylthiophene	–	–	ND	23	U	ND	23	U	ND	23	U	ND	23	U
872-55-9	2-Ethylthiophene	–	–	ND	23	U	ND	23	U	ND	23	U	ND	23	U
616-44-4	3-Methylthiophene	–	–	ND	20	U	ND	20	U	ND	20	U	ND	20	U
75-15-0	Carbon Disulfide	730	–	ND	7.8	U	ND	7.8	U	ND	7.8	U	ND	7.8	U
463-58-1	Carbonyl Sulfide	–	–	ND	12	U	ND	12	U	ND	12	U	ND	12	U
110-81-6	Diethyl Disulfide	–	–	ND	12	U	ND	12	U	ND	12	U	ND	12	U
352-93-2	Diethyl Sulfide	–	–	ND	18	U	ND	18	U	ND	18	U	ND	18	U
75-18-3	Dimethyl Sulfide	–	–	ND	13	U	ND	13	U	ND	13	U	ND	13	U
75-08-1	Ethyl Mercaptan	–	–	ND	13	U	ND	13	U	ND	13	U	ND	13	U
624-89-5	Ethyl Methyl Sulfide	–	–	ND	16	U	ND	16	U	ND	16	U	ND	16	U
7783-06-4	Hydrogen Sulfide	2.1	–	ND	7	U	ND	7	U	ND	7	U	ND	7	U
513-44-0	Isobutyl Mercaptan	–	–	ND	18	U	ND	18	U	ND	18	U	ND	18	U
75-33-2	Isopropyl Mercaptan	–	–	ND	16	U	ND	16	U	ND	16	U	ND	16	U
624-92-0	Methyl Disulfide	–	–	ND	9.6	U	ND	9.6	U	ND	9.6	U	ND	9.6	U
74-93-1	Methyl Mercaptan	–	–	ND	9.8	U	ND	9.8	U	ND	9.8	U	ND	9.8	U
109-79-5	n-Butyl Mercaptan	–	–	ND	18	U	ND	18	U	ND	18	U	ND	18	U
107-03-9	n-Propyl Mercaptan	–	–	ND	16	U	ND	16	U	ND	16	U	ND	16	U
75-66-1	tert-Butyl Mercaptan	–	–	ND	18	U	ND	18	U	ND	18	U	ND	18	U
110-01-0	Tetrahydrothiophene	–	–	ND	18	U	ND	18	U	ND	18	U	ND	18	U
110-02-1	Thiophene	–	–	ND	17	U	ND	17	U	ND	17	U	ND	17	U

Notes:

μg/m³ = micrograms per cubic meter

Qual = Lab Qualifier

MRL = Method Reporting Limit - The minimum quantity of a target analyte that

U = Compound was analyzed for, but not detected above the laboratory reporting limit.

UJ = Estimated non-detect quantitation as a result of the validation process.

ND = Not Detected

(=) Target compound was detected and confirmed to be present in the sample.

– = Regional Screening Level (RSL) does not exist for this parameter.

Yellow highlight signifies the exceedance of the RSL

RSLs are the residential values published November 2012,

http://www.epa.gov/reg3hwmd/risk/human/rb-concentration_table/Generic_Tables/pd

Appendix C-4

PM 10 Analyzed Using Gravimetric Methods

July 2012, October 2012, January 2013, and April 2013 Ambient Air Monitoring Events

Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgewater, New Jersey

Sample Location	PZAA-C3											
	PZAA-C3-072012			PZAA-C3-102412			PZAA-C3-010913			PZAA-C3-041113		
Sample Date	7/20/2012		10/24/2012		1/9/2013		4/11/2013		mg/sample	mg/sample	mg/m ³	
	Result	MRL	Air Volume	Result	MRL	Air Volume	Result	MRL	Air Volume	Result	MRL	Air Volume
Particulate as PM ₁₀	ND	1	<0.64	25	0.5	1	ND	0.5	<0.020	0.18	0.1	<0.64

Notes:

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

mg = milligrams

mg/m³ = milligrams per cubic meter

Appendix C-5

Comparison of Detected Analytes with Urban Background Concentrations

July 2012, October 2012, January 2013, and April 2013 Ambient Air Monitoring Events

Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgewater, New Jersey

Analyte	Range of Daily Average Urban Background Concentrations ($\mu\text{g}/\text{m}^3$)		Concentration Range Detected at the Bridgewater Site July 2012 ($\mu\text{g}/\text{m}^3$)	Concentration Range Detected at the Bridgewater Site October 2012 ($\mu\text{g}/\text{m}^3$)	Concentration Range Detected at the Bridgewater Site January 2013 ($\mu\text{g}/\text{m}^3$)	Concentration Range Detected at the Bridgewater Site April 2013 ($\mu\text{g}/\text{m}^3$)	Concentration Range Detected at the Bridgewater Site Total ($\mu\text{g}/\text{m}^3$)
	2008	2009					
Acetaldehyde	1.4 - 2.58	1.34 - 2.47	2.2 - 2.8	0.86 - 1.4	1.9 - 6.4	1.4 - 7.4	0.86 - 7.4
Benzene	0.56 - 1.36	0.6 - 1.83	0.55 - 5.3	1.6 - 33	1.3 - 4.3	0.69 - 12	0.55 - 33
1,3-Butadiene	0.04 - 0.15	0.03 - 0.16	0.34 - 0.71	0.4 - 0.63	<0.26 - <0.32	<0.28 - 3.4	<0.26 - 3.4
Carbon tetrachloride	0.64 - 0.73	0.67 - 0.72	0.46 - 0.62	0.38 - 0.55	0.41 - 0.49	<0.21 - 0.55	<0.21 - 0.62
Chloroform	0.07 - 0.18	0.11 - 0.17	0.17 - 0.27	0.18 - 0.35	0.15 - 0.22	<0.14 - 0.29	<0.14 - 0.35
Formaldehyde	1.47 - 3.31	2.43 - 3.8	1.1 - 2.6	<0.055 - 1.1	3 - 13	1.3 - 2.3	<0.055 - 13
Ethylbenzene	0.47 - 0.88	0.46	1.1 - 1.6	0.87 - 7.5	<0.66 - <0.8	<0.71 - <1.1	<0.66 - 7.5
1,4-Dichlorobenzene	0.11 - 0.19	0.07 - 0.12	<0.15	0.27 - 0.42	<0.13 - <0.16	<0.14 - <0.21	<0.13 - 0.42

Notes:

Source for Daily Average Urban Background: Table 19-5, EPA, 2011.

Appendix B

**Quarterly Sampling Event Summary Technical
Memorandums (Electronic)**

TECHNICAL MEMORANDUM**Summary of Ambient Air Monitoring Results****July 2012 Sampling Event****Former American Cyanamid Superfund Site, Bridgewater, New Jersey**

PREPARED FOR: Pfizer

PREPARED BY: CH2M HILL

DATE: July 22, 2013

Introduction

This technical memorandum presents the results for the first event of the ambient air monitoring program for the Former American Cyanamid Superfund Site in Bridgewater Township, New Jersey (Site). The overall objective of this program is to develop a baseline set of ambient air monitoring data to identify potential air quality impact during remedial actions. Air sampling was conducted on July 19-20, 2012 using the methods described in the *Ambient Air Monitoring Quality Assurance Project Plan* (May 2012). The sampling locations are shown in Figure 1.

Summary of Analytical Results

The analytical results are presented in the following tables:

- Volatile organic compounds (VOCs) analyzed using EPA Method TO-15 are presented in Table 1.
- Aldehydes analyzed using EPA Method TO-11A and polycyclic aromatic hydrocarbons (PAHs) analyzed using EPA Method TO-13A are presented in Table 2.
- Reduced sulfur compounds analyzed using ASTM Method 5504-08 are presented in Table 3.
- Particulate matter finer than 10 um in diameter (PM10) analyzed using gravimetric methods are presented in Table 4.

VOCs - Benzene, 1,3-butadiene, carbon tetrachloride, chloroform, ethylbenzene and vinyl chloride were detected at concentrations above their respective U.S. Environmental Protection Agency (EPA) Regional Screening Levels (RSLs) in air in at least one sample. The benzene, ethylbenzene and 1,3-butadiene results at each sampling location are shown in Figure 2. The carbon tetrachloride and chloroform results are shown in Figure 3. Vinyl chloride was detected in only a single sample and is not shown on a figure.

Aldehydes - Formaldehyde and acetaldehyde were detected at concentrations above the RSLs in two samples collected near Impoundments 1 and 2. These results are shown in Figure 4. Benzaldehyde, valeraldehyde and 2,5-dimethylbenzaldehyde also were detected at concentrations near their analytical reporting limits. There are no RSL values available for these three compounds.

Analytes not detected - Reduced sulfur compounds (including hydrogen sulfide), PAHs and particulate matter were not detected in any samples.

Comparison versus Background

The analytical results from the July 2012 sampling event were also compared with background levels in urban air. Urban air toxics monitoring is performed in four urban locations in New Jersey under the U.S. Environmental Protection Agency's (EPA) Urban Air Toxics Monitoring Program (UMATP). The most recently available UMATP monitoring data (EPA, 2011, presenting data from 2008 and 2009) were used for this comparison. The New Jersey monitoring sites are located in Camden, Chester, Elizabeth and New Brunswick. Analytical results from the July 2012 sampling event were compared with the reported daily average; the daily average of a particular pollutant is

the average concentration of all measured detections from sampling events performed by EPA in a year. The results from this comparison are shown in Table 5, and are discussed below in further detail:

- Concentrations of formaldehyde, acetaldehyde and carbon tetrachloride detected during the July 2012 sampling event were indistinguishable from the daily average urban background concentrations.
- The maximum benzene concentration (5.3 ug/m³) was detected at Location C4, near Impoundments 1 and 2. Benzene concentrations are lower at all of the other sampling locations and are not distinguishable from the daily urban background concentrations. While the maximum benzene concentration was higher than the daily average urban background concentrations, it is lower than the maximum urban background concentration for benzene (34.1 ug/m³) reported in the UATMP.
- Ethylbenzene concentrations are slightly higher than the daily average urban background concentrations, but appear to be uniformly distributed across all of the sampling locations (both near the impoundments and at the perimeter, both upwind and downwind). All ethylbenzene concentrations are lower than the maximum background concentration (7.2 ug/m³) reported in the UATMP. Other constituents in the BTEX cluster (toluene and xylene isomers) were included in Figure 1, to better show the distribution of analytes in air across the site. The results from Figure 1 show that the analyte concentrations generally are similar, regardless of proximity to the impoundments and direction upwind or downwind from the impoundments.
- Chloroform concentrations at some locations were slightly higher than the daily average urban background concentrations, but appear to be uniformly distributed across all of the sampling locations (both near the impoundments and at the perimeter, both upwind and downwind). All chloroform concentrations are lower than the maximum background concentration (7.6 ug/m³) reported in the UATMP.
- 1,3-Butadiene was detected in only two perimeter samples; while both of these results are higher than the daily average urban background concentrations, they are lower than the maximum background concentration (3.5 ug/m³) reported in the UATMP.
- Vinyl chloride was detected in only one perimeter sample; which this concentration was higher than the daily average urban background concentrations, it is lower than the maximum background concentration (0.18 ug/m³) reported in the UATMP.

The distribution of detected concentrations were also evaluated taking into consideration prevailing wind direction during the sampling event, as shown on the wind rose in the attached figures. This is the wind rose covering the days of the sampling event, as obtained from the Newark International Airport, 20 miles east-northeast of the site. The weather station at the airport provides reliable, high-quality data that can be considered representative of the general wind direction and wind speeds that would be observed at the site. Other observations of the data include the following:

- The prevailing wind direction during the sampling event was east to west. Perimeter sampling locations P1, P7, and P8 which are downwind of C4 where the highest benzene concentrations were detected, have concentrations of benzene at 0.57, 0.60, and 0.69 ug/m³, which are consistent with urban background as noted above.
- The highest concentration of benzene detected at the perimeter of the site (P6) was upwind of the prevailing wind direction during the sampling.
- No meaningful differences were seen of the average concentrations of toluene, ethylbenzene, xylenes, carbon tetrachloride, and chloroform from the impoundment and perimeter locations.
- The formaldehyde and acetaldehyde detected above the RSLs (C1 and C2) were upwind of the other two impoundments during the sampling event.

Based on this evaluation, the concentrations of analytes detected during the July 2012 are not detectable, or are not distinguishable from concentrations of volatile compounds normally present in ambient air in urban areas.

References

U.S. Environmental Protection Agency. 2011. *2008-2009 National Monitoring Programs (UATMP, NATTS and CSATAM), Volume I*. Office of Air Quality Planning and Standards. EPA-454/R-11-013a. December.

Sample Location Field Sample ID Sample Date Sample Type Units	PZAA-P1			PZAA-P2			PZAA-P3					
	PZAA-P1-072012			PZAA-P2-072012			PZAA-P3-072012					
	7/20/2012			7/20/2012			7/20/2012					
	Regular			Regular			Regular					
	$\mu\text{g}/\text{m}^3$			$\mu\text{g}/\text{m}^3$			$\mu\text{g}/\text{m}^3$					
CAS#	Parameter	Regional Screening Level	$\mu\text{g}/\text{m}^3$	Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual
115-07-1	Propene	–	—	1.9	0.73	M1	2.0	0.77	M1	21	0.75	—
75-71-8	Dichlorodifluoromethane (CFC 12)	100	—	2.3	0.73	—	2.5	0.77	—	2.2	0.75	—
74-87-3	Chloromethane	94	—	0.40	0.29	—	0.43	0.31	—	0.39	0.30	—
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	—	—	ND	0.73	—	ND	0.77	—	ND	0.75	—
75-01-4	Vinyl Chloride	0.16	—	ND	0.15	—	ND	0.15	—	ND	0.15	—
106-99-0	1,3-Butadiene	0.081	—	ND	0.29	—	ND	0.31	—	ND	0.30	—
74-83-9	Bromomethane	5.2	—	ND	0.15	—	ND	0.15	—	ND	0.15	—
75-00-3	Chloroethane	10,000	—	ND	0.15	—	ND	0.15	—	ND	0.15	—
64-17-5	Ethanol	—	—	20	7.3	—	13	7.7	—	470	7.5	—
75-05-8	Acetonitrile	—	—	ND	0.73	—	ND	0.77	—	0.84	0.75	—
107-02-8	Acrolein	—	—	ND	2.9	—	ND	3.1	—	ND	3.0	—
67-64-1	Acetone	32,000	—	19	7.3	—	11	7.7	—	29	7.5	—
75-69-4	Trichlorofluoromethane	730	—	1.2	0.15	—	1.3	0.15	—	1.2	0.15	—
67-63-0	2-Propanol (Isopropyl Alcohol)	—	—	ND	7.3	—	ND	7.7	—	82	7.5	—
107-13-1	Acrylonitrile	—	—	ND	0.73	—	ND	0.77	—	ND	0.75	—
75-35-4	1,1-Dichloroethene	210	—	ND	0.15	—	ND	0.15	—	ND	0.15	—
75-09-2	Methylene Chloride	96	—	0.74	0.73	—	0.91	0.77	—	1.3	0.75	—
107-05-1	3-Chloro-1-propene (Allyl Chloride)	—	—	ND	0.15	—	ND	0.15	—	ND	0.15	—
76-13-1	Trichlorotrifluoroethane	31,000	—	0.54	0.15	—	0.52	0.15	—	0.54	0.15	—
75-15-0	Carbon Disulfide	730	—	ND	7.3	—	ND	7.7	—	ND	7.5	—
156-60-5	trans-1,2-Dichloroethene	63	—	ND	0.15	—	ND	0.15	—	ND	0.15	—
75-34-3	1,1-Dichloroethane	1.5	—	ND	0.15	—	ND	0.15	—	ND	0.15	—
1634-04-4	Methyl tert-Butyl Ether	9.4	—	ND	0.15	—	ND	0.15	—	ND	0.15	—
108-05-4	Vinyl Acetate	—	—	ND	7.3	—	ND	7.7	—	ND	7.5	—
78-93-3	2-Butanone (MEK)	5,200	—	ND	7.3	—	ND	7.7	—	12	7.5	—
156-59-2	cis-1,2-Dichloroethene	63	—	ND	0.15	—	ND	0.15	—	ND	0.15	—
141-78-6	Ethyl Acetate	—	—	2.6	1.5	—	4.2	1.5	—	37	1.5	—
110-54-3	n-Hexane	730	—	0.78	0.73	—	ND	0.77	—	0.90	0.75	—
67-66-3	Chloroform	0.11	—	0.17	0.15	—	0.27	0.15	—	0.18	0.15	—
109-99-9	Tetrahydrofuran (THF)	—	—	ND	0.73	—	ND	0.77	—	ND	0.75	—
107-06-2	1,2-Dichloroethane	0.094	—	ND	0.15	—	ND	0.15	—	ND	0.15	—
71-55-6	1,1,1-Trichloroethane	5,200	—	ND	0.15	—	ND	0.15	—	ND	0.15	—
71-43-2	Benzene	0.31	—	0.57	0.15	—	0.55	0.15	—	1.0	0.15	—
56-23-5	Carbon Tetrachloride	0.41	—	0.53	0.15	—	0.51	0.15	—	0.62	0.15	—
110-82-7	Cyclohexane	6,300	—	ND	1.5	—	ND	1.5	—	ND	1.5	—
78-87-5	1,2-Dichloropropane	0.24	—	ND	0.15	—	ND	0.15	—	ND	0.15	—
75-27-4	Bromodichloromethane	42	—	ND	0.15	—	ND	0.15	—	ND	0.15	—
79-01-6	Trichloroethene	0.43	—	0.18	0.15	—	0.19	0.15	—	0.24	0.15	—
123-91-1	1,4-Dioxane	0.32	—	ND	0.73	—	ND	0.77	—	ND	0.75	—
80-62-6	Methyl Methacrylate	—	—	ND	1.5	—	ND	1.5	—	ND	1.5	—
142-82-5	n-Heptane	—	—	ND	0.73	—	ND	0.77	—	ND	0.75	—
10061-01-5	cis-1,3-Dichloropropene	0.61	—	ND	0.73	—	ND	0.77	—	ND	0.75	—
108-10-1	4-Methyl-2-pentanone	3,100	—	ND	0.73	—	ND	0.77	—	2.5	0.75	—
10061-02-6	trans-1,3-Dichloropropene	0.61	—	ND	0.73	—	ND	0.77	—	ND	0.75	—
79-00-5	1,1,2-Trichloroethane	0.15	—	ND	0.15	—	ND	0.15	—	ND	0.15	—
108-88-3	Toluene	3,100	—	3.3	0.73	—	3.0	0.77	—	4.3	0.75	—
591-78-6	2-Hexanone	31	—	0.88	0.73	—	ND	0.77	—	12	0.75	—
124-48-1	Dibromochloromethane	0.09	—	ND	0.15	—	ND	0.15	—	ND	0.15	—
106-93-4	1,2-Dibromoethane	0.0041	—	ND	0.15	—	ND	0.15	—	ND	0.15	—
123-86-4	n-Butyl Acetate	—	—	0.92	0.73	—	ND	0.77	—	0.76	0.75	—
111-65-9	n-Octane	—	—	ND	0.73	—	ND	0.77	—	ND	0.75	—
127-18-4	Tetrachloroethene	9.4	—	0.24	0.15	—	0.22	0.15	—	0.19	0.15	—
108-90-7	Chlorobenzene	52	—	ND	0.15	—	ND	0.15	—	ND	0.15	—
100-41-4	Ethylbenzene	0.97	—	1.2	0.73	—	1.1	0.77	—	1.6	0.75	—
179601-23-1	m,p-Xylenes	100	—	5.0	0.73	—	4.3	0.77	—	5.7	0.75	—
75-25-2	Bromoform	2.2	—	ND	0.73	—	ND	0.77	—	ND	0.75	—
100-42-5	Styrene	1,000	—	ND	0.73	—	ND	0.77	—	ND	0.75	—
95-47-6	o-Xylene	100	—	0.86	0.73	—	0.77	0.77	—	0.99	0.75	—
111-84-2	n-Nonane	—	—	ND	0.73	—	ND	0.77	—	ND	0.75	—
79-34-5	1,1,2,2-Tetrachloroethane	0.042	—	ND	0.15	—	ND	0.15	—	ND	0.15	—
98-82-8	Cumene	1,000	—	ND	0.73	—	ND	0.77	—	ND	0.75	—
80-56-8</												

Sample Location Field Sample ID Sample Date Sample Type Units	PZAA-P4			PZAA-P5			PZAA-P6				
	PZAA-P4-072012			PZAA-P5-072012			PZAA-P6-072012				
	7/20/2012			7/20/2012			7/20/2012				
	Regular			Regular			Regular				
	µg/m³			µg/m³			µg/m³				
CAS#	Parameter	Regional Screening Level µg/m³	Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual
115-07-1	Propene	—	1.8	0.76		2.3	0.73		3.3	0.80	
75-71-8	Dichlorodifluoromethane (CFC 12)	100	2.3	0.76		2.3	0.73		2.1	0.80	
74-87-3	Chloromethane	94	0.59	0.30		1.1	0.29		1.7	0.32	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	—	ND	0.76		ND	0.73		ND	0.80	
75-01-4	Vinyl Chloride	0.16	ND	0.15		ND	0.15		0.17	0.16	
106-99-0	1,3-Butadiene	0.081	ND	0.30		0.34	0.29		0.71	0.32	
74-83-9	Bromomethane	5.2	ND	0.15		ND	0.15		0.22	0.16	
75-00-3	Chloroethane	10,000	ND	0.15		ND	0.15		0.28	0.16	
64-17-5	Ethanol	—	46	7.6		45	7.3		72	8.0	
75-05-8	Acetonitrile	—	ND	0.76		ND	0.73		ND	0.80	
107-02-8	Acrolein	—	5.9	3.0		18	2.9		33	3.2	
67-64-1	Acetone	32,000	130	7.6		350	7.3		600	8.0	
75-69-4	Trichlorofluoromethane	730	1.2	0.15		1.2	0.15		1.2	0.16	
67-63-0	2-Propanol (Isopropyl Alcohol)	—	ND	7.6		ND	7.3		ND	8.0	
107-13-1	Acrylonitrile	—	ND	0.76		ND	0.73		ND	0.80	
75-35-4	1,1-Dichloroethene	210	ND	0.15		ND	0.15		ND	0.16	
75-09-2	Methylene Chloride	96	1.7	0.76		1.1	0.73		1.2	0.80	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	—	ND	0.15		ND	0.15		ND	0.16	
76-13-1	Trichlorotrifluoroethane	31,000	0.54	0.15		0.51	0.15		0.51	0.16	
75-15-0	Carbon Disulfide	730	ND	7.6		ND	7.3		ND	8.0	
156-60-5	trans-1,2-Dichloroethene	63	ND	0.15		ND	0.15		ND	0.16	
75-34-3	1,1-Dichloroethane	1.5	ND	0.15		ND	0.15		ND	0.16	
1634-04-4	Methyl tert-Butyl Ether	9.4	ND	0.15		ND	0.15		ND	0.16	
108-05-4	Vinyl Acetate	—	ND	7.6		13	7.3		17	8.0	
78-93-3	2-Butanone (MEK)	5,200	8.2	7.6		9.7	7.3		16	8.0	
156-59-2	cis-1,2-Dichloroethene	63	ND	0.15		ND	0.15		ND	0.16	
141-78-6	Ethyl Acetate	—	3.0	1.5		4.1	1.5		4.7	1.6	
110-54-3	n-Hexane	730	1.6	0.76		1.3	0.73		1.6	0.80	
67-66-3	Chloroform	0.11	0.18	0.15		0.19	0.15		0.23	0.16	
109-99-9	Tetrahydrofuran (THF)	—	ND	0.76		ND	0.73		0.91	0.80	
107-06-2	1,2-Dichloroethane	0.094	ND	0.15		ND	0.15		ND	0.16	
71-55-6	1,1,1-Trichloroethane	5,200	ND	0.15		ND	0.15		ND	0.16	
71-43-2	Benzene	0.31	0.84	0.15		0.90	0.15		1.6	0.16	
56-23-5	Carbon Tetrachloride	0.41	0.46	0.15		0.45	0.15		0.48	0.16	
110-82-7	Cyclohexane	6,300	3.5	1.5		2.8	1.5		2.7	1.6	
78-87-5	1,2-Dichloropropane	0.24	ND	0.15		ND	0.15		0.17	0.16	
75-27-4	Bromodichloromethane	42	ND	0.15		ND	0.15		ND	0.16	
79-01-6	Trichloroethene	0.43	ND	0.15		ND	0.15		ND	0.16	
123-91-1	1,4-Dioxane	0.32	ND	0.76		ND	0.73		ND	0.80	
80-62-6	Methyl Methacrylate	—	ND	1.5		ND	1.5		ND	1.6	
142-82-5	n-Heptane	—	1.3	0.76		1.1	0.73		1.5	0.80	
10061-01-5	cis-1,3-Dichloropropene	0.61	ND	0.76		ND	0.73		ND	0.80	
108-10-1	4-Methyl-2-pentanone	3,100	ND	0.76		ND	0.73		ND	0.80	
10061-02-6	trans-1,3-Dichloropropene	0.61	ND	0.76		ND	0.73		ND	0.80	
79-00-5	1,1,2-Trichloroethane	0.15	ND	0.15		ND	0.15		ND	0.16	
108-88-3	Toluene	3,100	4.6	0.76		4.6	0.73		5.1	0.80	
591-78-6	2-Hexanone	31	ND	0.76		ND	0.73		ND	0.80	
124-48-1	Dibromochloromethane	0.09	ND	0.15		ND	0.15		ND	0.16	
106-93-4	1,2-Dibromoethane	0.0041	ND	0.15		ND	0.15		ND	0.16	
123-86-4	n-Butyl Acetate	—	ND	0.76		ND	0.73		ND	0.80	
111-65-9	n-Octane	—	4.5	0.76		4.5	0.73		5.4	0.80	
127-18-4	Tetrachloroethene	9.4	0.18	0.15		0.16	0.15		ND	0.16	
108-90-7	Chlorobenzene	52	ND	0.15		ND	0.15		ND	0.16	
100-41-4	Ethylbenzene	0.97	0.83	0.76		0.79	0.73		0.84	0.80	
179601-23-1	m,p-Xylenes	100	2.2	0.76		1.9	0.73		2.2	0.80	
75-25-2	Bromoform	2.2	ND	0.76		ND	0.73		ND	0.80	
100-42-5	Styrene	1,000	1.1	0.76		1.0	0.73		1.2	0.80	
95-47-6	o-Xylene	100	1.0	0.76		0.92	0.73		1.1	0.80	
111-84-2	n-Nonane	—	1.2	0.76		1.1	0.73		1.3	0.80	
79-34-5	1,1,2,2-Tetrachloroethane	0.042	ND	0.15		ND	0.15		ND	0.16	
98-82-8	Cumene	1,000	ND	0.76		ND	0.73		ND	0.80	
80-56-8	alpha-Pinene	—	13	0.76		11	0.73		14	0.80	
103-65-1	n-Propylbenzene	1,000	ND	0.76		ND	0.73		ND	0.80	
622-96-8	4-Ethyltoluene	—	ND	0.76		ND	0.73		ND	0.80	
108-67-8	1,3,5-Trimethylbenzene	7.3	ND	0.76		ND	0.73		ND	0.80	
95-63-6	1,2,4-Trimethylbenzene	7.3	1.3	0.76		1.1	0.73		1.3	0.80	
100-44-7	Benzyl Chloride	0.05	ND	0.76		ND	0.73		ND	0.80	
541-73-1	1,3-Dichlorobenzene	210	0.62	0.15		0.79	0.15		0.52	0.16	
106-46-7	1,4-Dichlorobenzene	0.22	ND	0.15		ND	0.15		ND	0.16	
95-50-1	1,2-Dichlorobenzene	210	ND	0.15		ND	0.15		ND	0.16	
5989-27-5	d-Limonene	—	2.6	0.76		2.2	0.73		2.4	0.80	

Sample Location Field Sample ID Sample Date Sample Type Units	PZAA-P7			PZAA-P8			PZAA-C1		
	PZAA-P7-072012			PZAA-P8-072012			PZAA-C1-072012		
	7/20/2012			7/20/2012			7/20/2012		
	Regular µg/m³			Regular µg/m³			Regular µg/m³		
CAS#	Parameter	Regional Screening Level	µg/m³	Result	MRL	Qual	Result	MRL	Qual
115-07-1	Propene	—	—	1.4	0.80	M1	1.5	0.82	M1
75-71-8	Dichlorodifluoromethane (CFC 12)	100	2.3	0.80	—	—	2.5	0.82	—
74-87-3	Chloromethane	94	0.40	0.32	—	—	0.44	0.33	—
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	—	ND	0.80	—	—	ND	0.82	—
75-01-4	Vinyl Chloride	0.16	ND	0.16	—	—	ND	0.16	—
106-99-0	1,3-Butadiene	0.081	ND	0.32	—	—	ND	0.33	—
74-83-9	Bromomethane	5.2	ND	0.16	—	—	ND	0.16	—
75-00-3	Chloroethane	10,000	ND	0.16	—	—	ND	0.16	—
64-17-5	Ethanol	—	11	8.0	—	—	13	8.2	—
75-05-8	Acetonitrile	—	ND	0.80	—	—	ND	0.82	—
107-02-8	Acrolein	—	ND	3.2	—	—	ND	3.3	—
67-64-1	Acetone	32,000	17	8.0	—	—	15	8.2	—
75-69-4	Trichlorofluoromethane	730	1.3	0.16	—	—	1.3	0.16	—
67-63-0	2-Propanol (Isopropyl Alcohol)	—	ND	8.0	—	—	ND	8.2	—
107-13-1	Acrylonitrile	—	ND	0.80	—	—	ND	0.82	—
75-35-4	1,1-Dichloroethene	210	ND	0.16	—	—	ND	0.16	—
75-09-2	Methylene Chloride	96	0.89	0.80	—	—	0.87	0.82	—
107-05-1	3-Chloro-1-propene (Allyl Chloride)	—	ND	0.16	—	—	ND	0.16	—
76-13-1	Trichlorotrifluoroethane	31,000	0.58	0.16	—	—	0.54	0.16	—
75-15-0	Carbon Disulfide	730	ND	8.0	—	—	ND	8.2	—
156-60-5	trans-1,2-Dichloroethene	63	ND	0.16	—	—	ND	0.16	—
75-34-3	1,1-Dichloroethane	1.5	ND	0.16	—	—	ND	0.16	—
1634-04-4	Methyl tert-Butyl Ether	9.4	ND	0.16	—	—	ND	0.16	—
108-05-4	Vinyl Acetate	—	ND	8.0	—	—	ND	8.2	—
78-93-3	2-Butanone (MEK)	5,200	ND	8.0	—	—	ND	8.2	—
156-59-2	cis-1,2-Dichloroethene	63	ND	0.16	—	—	ND	0.16	—
141-78-6	Ethyl Acetate	—	5.2	1.6	—	—	2.5	1.6	—
110-54-3	n-Hexane	730	ND	0.80	—	—	ND	0.82	—
67-66-3	Chloroform	0.11	0.17	0.16	—	—	0.27	0.16	—
109-99-9	Tetrahydrofuran (THF)	—	ND	0.80	—	—	ND	0.82	—
107-06-2	1,2-Dichloroethane	0.094	ND	0.16	—	—	ND	0.16	—
71-55-6	1,1,1-Trichloroethane	5,200	ND	0.16	—	—	ND	0.16	—
71-43-2	Benzene	0.31	0.60	0.16	—	—	0.69	0.16	—
56-23-5	Carbon Tetrachloride	0.41	0.45	0.16	—	—	0.50	0.16	—
110-82-7	Cyclohexane	6,300	ND	1.6	—	—	ND	1.6	—
78-87-5	1,2-Dichloropropane	0.24	ND	0.16	—	—	ND	0.16	—
75-27-4	Bromodichloromethane	42	ND	0.16	—	—	ND	0.16	—
79-01-6	Trichloroethene	0.43	ND	0.16	—	—	0.24	0.16	—
123-91-1	1,4-Dioxane	0.32	ND	0.80	—	—	ND	0.82	—
80-62-6	Methyl Methacrylate	—	ND	1.6	—	—	ND	1.6	—
142-82-5	n-Heptane	—	ND	0.80	—	—	ND	0.82	—
10061-01-5	cis-1,3-Dichloropropene	0.61	ND	0.80	—	—	ND	0.82	—
108-10-1	4-Methyl-2-pentanone	3,100	ND	0.80	—	—	ND	0.82	—
10061-02-6	trans-1,3-Dichloropropene	0.61	ND	0.80	—	—	ND	0.82	—
79-00-5	1,1,2-Trichloroethane	0.15	ND	0.16	—	—	ND	0.16	—
108-88-3	Toluene	3,100	2.1	0.80	—	—	3.5	0.82	—
591-78-6	2-Hexanone	31	ND	0.80	—	—	ND	0.82	—
124-48-1	Dibromochloromethane	0.09	ND	0.16	—	—	ND	0.16	—
106-93-4	1,2-Dibromoethane	0.0041	ND	0.16	—	—	ND	0.16	—
123-86-4	n-Butyl Acetate	—	ND	0.80	—	—	ND	0.82	—
111-65-9	n-Octane	—	ND	0.80	—	—	ND	0.82	—
127-18-4	Tetrachloroethene	9.4	0.18	0.16	—	—	0.22	0.16	—
108-90-7	Chlorobenzene	52	ND	0.16	—	—	ND	0.16	—
100-41-4	Ethylbenzene	0.97	ND	0.80	—	—	1.3	0.82	—
179601-23-1	m,p-Xylenes	100	1.7	0.80	—	—	5.0	0.82	—
75-25-2	Bromoform	2.2	ND	0.80	—	—	ND	0.82	—
100-42-5	Styrene	1,000	ND	0.80	—	—	ND	0.82	—
95-47-6	o-Xylene	100	ND	0.80	—	—	0.88	0.82	—
111-84-2	n-Nonane	—	ND	0.80	—	—	ND	0.82	—
79-34-5	1,1,2,2-Tetrachloroethane	0.042	ND	0.16	—	—	ND	0.16	—
98-82-8	Cumene	1,000	ND	0.80	—	—	ND	0.82	—
80-56-8	alpha-Pinene	—	ND	0.80	—	—	ND	0.82	—
103-65-1	n-Propylbenzene	1,000	ND	0.80	—	—	ND	0.82	—
622-96-8	4-Ethyltoluene	—	ND	0.80	—	—	ND	0.82	—
108-67-8	1,3,5-Trimethylbenzene	7.3	ND	0.80	—	—	ND	0.82	—
95-63-6	1,2,4-Trimethylbenzene	7.3	ND	0.80	—	—	0.92	0.82	—
100-44-7	Benzyl Chloride	0.05	ND	0.80	—	—	ND	0.82	—
541-73-1	1,3-Dichlorobenzene	210	ND	0.16	—	—	ND	0.16	—
106-46-7	1,4-Dichlorobenzene	0.22	ND	0.16	—	—	ND	0.16	—
95-50-1	1,2-Dichlorobenzene	210	ND	0.16	—	—	ND	0.16	—
5989-27-5	d-Limonene	—	ND	0.80	—	—	ND	0.82	—
96-12-8	1,2-Dibromo-3-chloropropane	—	ND	0.80	—	—	ND	0.82	—
120-82-1	1,2,4-Trichlorobenzene	2.1	ND	0.80	—	—	ND	0.82	—
91-20-3	Naphthalene	0.072	ND	0.80	—	—	ND	0.82	—
87-68-3	Hexachlorobutadiene	0.11	ND	0.80	—	—	ND	0.82	—

Notes:

µg/m³ = micrograms per cubic meter

Qual = Lab Qualifier

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be cor-

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

M1 = Matrix interference due to coelution with a non-target compound; results may be bia-

-- = Regional Screening Level (RSL) does not exist for this parameter.

Sample Location Field Sample ID Sample Date Sample Type Units	PZAA-C2			PZAA-C3				
	PZAA-C2-072012			PZAA-C3-072012		PZAA-C3-072012-D		
	7/20/2012			7/20/2012				
	Regular µg/m³			Regular µg/m³		Duplicate µg/m³		
CAS#	Parameter	Regional Screening Level µg/m³	Result	MRL	Qual	Result	MRL	Qual
115-07-1	Propene	—	1.5	0.77	M1	4.4	0.76	J
75-71-8	Dichlorodifluoromethane (CFC 12)	100	2.4	0.77		2.4	0.76	2.5
74-87-3	Chloromethane	94	0.43	0.31		0.38	0.30	0.39
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	—	ND	0.77		ND	0.76	ND
75-01-4	Vinyl Chloride	0.16	ND	0.15		ND	0.15	ND
106-99-0	1,3-Butadiene	0.081	ND	0.31		ND	0.30	ND
74-83-9	Bromomethane	5.2	ND	0.15		ND	0.15	ND
75-00-3	Chloroethane	10,000	ND	0.15		ND	0.15	ND
64-17-5	Ethanol	—	15	7.7		29	7.6	23
75-05-8	Acetonitrile	—	ND	0.77		ND	0.76	ND
107-02-8	Acrolein	—	ND	3.1		ND	3.0	ND
67-64-1	Acetone	32,000	13	7.7		15	7.6	22
75-69-4	Trichlorofluoromethane	730	1.3	0.15		1.3	0.15	1.3
67-63-0	2-Propanol (Isopropyl Alcohol)	—	ND	7.7		11	7.6	ND
107-13-1	Acrylonitrile	—	ND	0.77		ND	0.76	ND
75-35-4	1,1-Dichloroethene	210	ND	0.15		ND	0.15	ND
75-09-2	Methylene Chloride	96	1.2	0.77		1.2	0.76	1.2
107-05-1	3-Chloro-1-propene (Allyl Chloride)	—	ND	0.15		ND	0.15	ND
76-13-1	Trichlorotrifluoroethane	31,000	0.57	0.15		0.57	0.15	0.58
75-15-0	Carbon Disulfide	730	ND	7.7		ND	7.6	ND
156-60-5	trans-1,2-Dichloroethene	63	ND	0.15		ND	0.15	ND
75-34-3	1,1-Dichloroethane	1.5	ND	0.15		ND	0.15	ND
1634-04-4	Methyl tert-Butyl Ether	9.4	ND	0.15		ND	0.15	ND
108-05-4	Vinyl Acetate	—	ND	7.7		ND	7.6	ND
78-93-3	2-Butanone (MEK)	5,200	ND	7.7		ND	7.6	ND
156-59-2	cis-1,2-Dichloroethene	63	ND	0.15		ND	0.15	ND
141-78-6	Ethyl Acetate	—	5.3	1.5		5.2	1.5	5.6
110-54-3	n-Hexane	730	0.83	0.77		0.86	0.76	0.77
67-66-3	Chloroform	0.11	0.18	0.15		0.18	0.15	0.17
109-99-9	Tetrahydrofuran (THF)	—	ND	0.77		ND	0.76	ND
107-06-2	1,2-Dichloroethane	0.094	ND	0.15		ND	0.15	ND
71-55-6	1,1,1-Trichloroethane	5,200	ND	0.15		ND	0.15	ND
71-43-2	Benzene	0.31	1.0	0.15		1.3	0.15	1.3
56-23-5	Carbon Tetrachloride	0.41	0.46	0.15		0.49	0.15	0.54
110-82-7	Cyclohexane	6,300	ND	1.5		ND	1.5	ND
78-87-5	1,2-Dichloropropane	0.24	ND	0.15		ND	0.15	ND
75-27-4	Bromodichloromethane	42	ND	0.15		ND	0.15	ND
79-01-6	Trichloroethene	0.43	0.17	0.15		ND	0.15	ND
123-91-1	1,4-Dioxane	0.32	ND	0.77		ND	0.76	ND
80-62-6	Methyl Methacrylate	—	ND	1.5		ND	1.5	ND
142-82-5	n-Heptane	—	0.81	0.77		0.77	0.76	ND
10061-01-5	cis-1,3-Dichloropropene	0.61	ND	0.77		ND	0.76	ND
108-10-1	4-Methyl-2-pentanone	3,100	ND	0.77		ND	0.76	ND
10061-02-6	trans-1,3-Dichloropropene	0.61	ND	0.77		ND	0.76	ND
79-00-5	1,1,2-Trichloroethane	0.15	ND	0.15		ND	0.15	ND
108-88-3	Toluene	3,100	3.5	0.77		3.1	0.76	3.2
591-78-6	2-Hexanone	31	ND	0.77		ND	0.76	ND
124-48-1	Dibromochloromethane	0.09	ND	0.15		ND	0.15	ND
106-93-4	1,2-Dibromoethane	0.0041	ND	0.15		ND	0.15	ND
123-86-4	n-Butyl Acetate	—	ND	0.77		ND	0.76	ND
111-65-9	n-Octane	—	ND	0.77		ND	0.76	ND
127-18-4	Tetrachloroethene	9.4	0.30	0.15		0.23	0.15	0.22
108-90-7	Chlorobenzene	52	ND	0.15		ND	0.15	ND
100-41-4	Ethylbenzene	0.97	1.1	0.77		0.84	0.76	0.88
179601-23-1	m,p-Xylenes	100	4.0	0.77		3.0	0.76	3.1
75-25-2	Bromoform	2.2	ND	0.77		ND	0.76	ND
100-42-5	Styrene	1,000	ND	0.77		ND	0.76	ND
95-47-6	o-Xylene	100	ND	0.77		ND	0.76	ND
111-84-2	n-Nonane	—	ND	0.77		ND	0.76	ND
79-34-5	1,1,2,2-Tetrachloroethane	0.042	ND	0.15		ND	0.15	ND
98-82-8	Cumene	1,000	ND	0.77		ND	0.76	ND
80-56-8	alpha-Pinene	—	ND	0.77		ND	0.76	ND
103-65-1	n-Propylbenzene	1,000	ND	0.77		ND	0.76	ND
622-96-8	4-Ethyltoluene	—	ND	0.77		ND	0.76	ND
108-67-8	1,3,5-Trimethylbenzene	7.3	ND	0.77		ND	0.76	ND
95-63-6	1,2,4-Trimethylbenzene	7.3	0.81	0.77		ND	0.76	ND
100-44-7	Benzyl Chloride	0.05	ND	0.77		ND	0.76	ND
541-73-1	1,3-Dichlorobenzene	210	ND	0.15		ND	0.15	ND
106-46-7	1,4-Dichlorobenzene	0.22	ND	0.15		ND	0.15	ND
95-50-1	1,2-Dichlorobenzene	210	ND	0.15		ND	0.15	ND
5989-27-5	d-Limonene	—	ND	0.77		ND	0.76	ND
96-12-8	1,2-Dibromo-3-chloropropane	—	ND	0.77		ND	0.76	ND
120-82-1	1,2,4-Trichlorobenzene	2.1	ND	0.77		ND	0.76	ND
91-20-3	Naphthalene	0.072	ND	0.77		ND	0.76	ND
87-68-3	Hexachlorobutadiene	0.11	ND	0.77		ND	0.76	ND

Notes:

µg/m³ = micrograms per cubic meter

Qual = Lab Qualifier

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be cor-

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

M1 = Matrix interference due to coelution with a non-target compound; results may be bia-

-- = Regional Screening Level (RSL) does not exist for this parameter.

Yellow highlight = Exceedance of the RSL

RSLs are the residential values published May 2012,
http://www.epa.gov/reg3hwmd/risk/human/rbconcentration_table/index.htm

Sample Location	PZAA-C4
Field Sample ID	PZAA-C4-072012
Sample Date	7/20/2012
Sample Type	Regular
Units	µg/m³

CAS#	Parameter	Regional Screening Level µg/m³	Result	MRL	Qual
115-07-1	Propene	—	1.1	0.71	
75-71-8	Dichlorodifluoromethane (CFC 12)	100	2.5	0.71	
74-87-3	Chloromethane	94	0.38	0.28	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	—	ND	0.71	
75-01-4	Vinyl Chloride	0.16	ND	0.14	
106-99-0	1,3-Butadiene	0.081	ND	0.28	
74-83-9	Bromomethane	5.2	ND	0.14	
75-00-3	Chloroethane	10,000	ND	0.14	
64-17-5	Ethanol	—	20	7.1	
75-05-8	Acetonitrile	—	ND	0.71	
107-02-8	Acrolein	—	ND	2.8	
67-64-1	Acetone	32,000	14	7.1	
75-69-4	Trichlorofluoromethane	730	1.2	0.14	
67-63-0	2-Propanol (Isopropyl Alcohol)	—	ND	7.1	
107-13-1	Acrylonitrile	—	ND	0.71	
75-35-4	1,1-Dichloroethene	210	ND	0.14	
75-09-2	Methylene Chloride	96	1.1	0.71	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	—	ND	0.14	
76-13-1	Trichlorotrifluoroethane	31,000	0.49	0.14	
75-15-0	Carbon Disulfide	730	ND	7.1	
156-60-5	trans-1,2-Dichloroethene	63	ND	0.14	
75-34-3	1,1-Dichloroethane	1.5	ND	0.14	
1634-04-4	Methyl tert-Butyl Ether	9.4	ND	0.14	
108-05-4	Vinyl Acetate	—	ND	7.1	
78-93-3	2-Butanone (MEK)	5,200	ND	7.1	
156-59-2	cis-1,2-Dichloroethene	63	ND	0.14	
141-78-6	Ethyl Acetate	—	5.6	1.4	
110-54-3	n-Hexane	730	0.77	0.71	
67-66-3	Chloroform	0.11	0.20	0.14	
109-99-9	Tetrahydrofuran (THF)	—	ND	0.71	
107-06-2	1,2-Dichloroethane	0.094	ND	0.14	
71-55-6	1,1,1-Trichloroethane	5,200	ND	0.14	
71-43-2	Benzene	0.31	5.3	0.14	
56-23-5	Carbon Tetrachloride	0.41	0.46	0.14	
110-82-7	Cyclohexane	6,300	ND	1.4	
78-87-5	1,2-Dichloropropane	0.24	ND	0.14	
75-27-4	Bromodichloromethane	42	ND	0.14	
79-01-6	Trichloroethene	0.43	0.16	0.14	
123-91-1	1,4-Dioxane	0.32	ND	0.71	
80-62-6	Methyl Methacrylate	—	ND	1.4	
142-82-5	n-Heptane	—	0.71	0.71	
10061-01-5	cis-1,3-Dichloropropene	0.61	ND	0.71	
108-10-1	4-Methyl-2-pentanone	3,100	ND	0.71	
10061-02-6	trans-1,3-Dichloropropene	0.61	ND	0.71	
79-00-5	1,1,2-Trichloroethane	0.15	ND	0.14	
108-88-3	Toluene	3,100	3.8	0.71	
591-78-6	2-Hexanone	31	ND	0.71	
124-48-1	Dibromochloromethane	0.09	ND	0.14	
106-93-4	1,2-Dibromoethane	0.0041	ND	0.14	
123-86-4	n-Butyl Acetate	—	ND	0.71	
111-65-9	n-Octane	—	ND	0.71	
127-18-4	Tetrachloroethene	9.4	0.23	0.14	
108-90-7	Chlorobenzene	52	ND	0.14	
100-41-4	Ethylbenzene	0.97	0.89	0.71	
179601-23-1	m,p-Xylenes	100	3.3	0.71	
75-25-2	Bromoform	2.2	ND	0.71	
100-42-5	Styrene	1,000	ND	0.71	
95-47-6	o-Xylene	100	0.73	0.71	
111-84-2	n-Nonane	—	ND	0.71	
79-34-5	1,1,2,2-Tetrachloroethane	0.042	ND	0.14	
98-82-8	Cumene	1,000	ND	0.71	
80-56-8	alpha-Pinene	—	ND	0.71	
103-65-1	n-Propylbenzene	1,000	ND	0.71	
622-96-8	4-Ethyltoluene	—	ND	0.71	
108-67-8	1,3,5-Trimethylbenzene	7.3	ND	0.71	
95-63-6	1,2,4-Trimethylbenzene	7.3	ND	0.71	
100-44-7	Benzyl Chloride	0.05	ND	0.71	
541-73-1	1,3-Dichlorobenzene	210	ND	0.14	
106-46-7	1,4-Dichlorobenzene	0.22	ND	0.14	
95-50-1	1,2-Dichlorobenzene	210	0.21	0.14	
5989-27-5	d-Limonene	—	ND	0.71	
96-12-8	1,2-Dibromo-3-chloropropane	—	ND	0.71	
120-82-1	1,2,4-Trichlorobenzene	2.1	ND	0.71	
91-20-3	Naphthalene	0.072	ND	0.71	
87-68-3	Hexachlorobutadiene	0.11	ND	0.71	

Notes:

µg/m³ = micrograms per cubic meter

Qual = Lab Qualifier

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be cor

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

M1 = Matrix interference due to coelution with a non-target compound; results may be bia

-- = Regional Screening Level (RSL) does not exist for this parameter.

Yellow highlight = Exceedance of the RSL

RSLs are the residential values published May 2012,

http://www.epa.gov/reg3hwmd/risk/human/rbconcentration_table/index.htm

CAS#	Parameter	Regional Screening Level µg/m³	PZAA-C1			PZAA-C2			PZAA-C3					
			Field Sample ID		PZAA-C1-072012	Field Sample ID		PZAA-C2-072012	Field Sample ID		PZAA-C3-072012			
			Sample Date		7/20/2012	Sample Date		7/20/2012	Sample Date		7/20/2012			
			Sample Type		Regular		Regular		Regular		Duplicate			
			Units		µg/m³		µg/m³		µg/m³		µg/m³			
			Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual
50-00-0	FORMALDEHYDE	0.19	1.1	0.055	=	2.6	0.055	=				NA		
75-07-0	ACETALDEHYDE	1.1	2.8	0.055	=	2.2	0.055	=				NA		
123-38-6	n-PROPANOL	8.3	0.055	0.055	U	0.055	0.055	U				NA		
4170-30-3	CROTONALDEHYDE	-	0.055	0.055	U	0.055	0.055	U				NA		
123-72-8	Butyraldehyde	-	0.055	0.055	U	0.055	0.055	U				NA		
100-52-7	BENZALDEHYDE	-	0.06	0.055	=	0.055	0.055	U				NA		
590-86-3	3-Methylbutyraldehyde	-	0.055	0.055	U	0.055	0.055	U				NA		
110-62-3	Valeraldehyde	-	0.09	0.055	=	0.14	0.055	=				NA		
529-20-4	2-Methylbenzaldehyde	-	0.055	0.055	U	0.055	0.055	U				NA		
NA	3-Methylbenzaldehyde + 4-Methylbenzaldehyde	-	0.11	0.11	U	0.11	0.11	U				NA		
66-25-1	HEXANAL	-	0.055	0.055	U	0.055	0.055	U				NA		
5779-94-2	2,5-DIMETHYLBENZALDEHYDE	-	0.12	0.055	=	0.16	0.055	=				NA		
91-20-3	NAPHTHALENE	0.072	2.8	2.8	U	2.7	2.7	U	3.3	3.3	U	3.3	3.3	U
208-96-8	ACENAPHTHYLENE	-	0.28	0.28	U	0.27	0.27	U	0.33	0.33	U	0.33	0.33	U
83-32-9	ACENAPHTHENE	-	0.28	0.28	U	0.27	0.27	U	0.33	0.33	U	0.33	0.33	U
86-73-7	FLUORENE	-	0.28	0.28	U	0.27	0.27	U	0.33	0.33	U	0.33	0.33	U
85-01-8	PHENANTHRENE	-	0.28	0.28	U	0.27	0.27	U	0.33	0.33	U	0.33	0.33	U
120-12-7	ANTHRACENE	-	0.28	0.28	U	0.27	0.27	U	0.33	0.33	U	0.33	0.33	U
206-44-0	FLUORANTHENE	-	0.28	0.28	U	0.27	0.27	U	0.33	0.33	U	0.33	0.33	U
129-00-0	PYRENE	-	0.28	0.28	U	0.27	0.27	U	0.33	0.33	U	0.33	0.33	U
56-55-3	BENZO(a)ANTHRACENE	0.0087	0.28	0.28	U	0.27	0.27	U	0.33	0.33	U	0.33	0.33	U
218-01-9	CHRYSENE	0.087	0.28	0.28	U	0.27	0.27	U	0.33	0.33	U	0.33	0.33	U
205-99-2	BENZO(b)FLUORANTHENE	0.0087	0.28	0.28	U	0.27	0.27	U	0.33	0.33	U	0.33	0.33	U
207-08-9	BENZO(k)FLUORANTHENE	0.0087	0.28	0.28	U	0.27	0.27	U	0.33	0.33	U	0.33	0.33	U
50-32-8	BENZO(a)PYRENE	0.00087	0.28	0.28	U	0.27	0.27	U	0.33	0.33	U	0.33	0.33	U
193-39-5	INDENO(1,2,3-c,d)PYRENE	0.0087	0.28	0.28	U	0.27	0.27	U	0.33	0.33	U	0.33	0.33	U
53-70-3	DIBENZ(a,h)ANTHRACENE	0.0008	0.28	0.28	U	0.27	0.27	U	0.33	0.33	U	0.33	0.33	U
191-24-2	BENZO(g,h,i)PERYLENE	-	0.28	0.28	U	0.27	0.27	U	0.33	0.33	U	0.33	0.33	U
81103-79-9	FLUORENE-D10	-	74	N/A	=	75	N/A	=	77	N/A	=	74	N/A	=
1718-52-1	PYRENE-d10	-	76	N/A	=	83	N/A	=	81	N/A	=	79	N/A	=

Notes:

µg/m³ = micrograms per cubic meter

Qual = Lab Qualifier

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

U = Compound was analyzed for, but not detected above the laboratory reporting limit.

N/A = Not Applicable

NA = Not Analyzed

- = Regional Screening Level (RSL) does not exist for this parameter.

Yellow highlight = Exceedance of the RSL

RSLs are the residential values published May 2012,

http://www.epa.gov/reg3hwmd/risk/human/rbconcentration_table/index.htm

CAS	Parameter	Regional Screening Level µg/m³	Sample Location	PZAA-C1			PZAA-C1			PZAA-C1			PZAA-C2			PZAA-C2		
			Field Sample ID	PZAA-C1a-072012			PZAA-C1b-072012			PZAA-C1c-072012			PZAA-C2a-072012			PZAA-C2b-072012		
			Sample Date	7/19/2012			7/19/2012			7/19/2012			7/19/2012			7/19/2012		
			Sample Type	Regular														
			Units	µg/m³														
				Result	MRL	Qual												
7783-06-4	HYDROGEN SULFIDE	2.1		7	7	U	7	7	U	7	7	U	7	7	U	7	7	U
463-58-1	Carbonyl Sulfide	-		12	12	U												
74-93-1	Methyl Mercaptan	-		9.8	9.8	U												
75-08-1	Ethyl Mercaptan	-		13	13	U												
75-18-3	Dimethyl Sulfide	-		13	13	U												
75-15-0	CARBON DISULFIDE	730		7.8	7.8	U												
75-33-2	Isopropyl Mercaptan	-		16	16	U												
75-66-1	tert-Butyl Mercaptan	-		18	18	U												
107-03-9	n-Propyl Mercaptan	-		16	16	U												
624-89-5	Ethyl Methyl Sulfide	-		16	16	U												
110-02-1	Thiophene	-		17	17	U												
513-44-0	Isobutyl Mercaptan	-		18	18	U												
352-93-2	Diethyl Sulfide	-		18	18	U												
109-79-5	n-Butyl Mercaptan	-		18	18	U												
624-92-0	METHYL DISULFIDE	-		9.6	9.6	U												
616-44-4	3-Methylthiophene	-		20	20	U												
110-01-0	Tetrahydrothiophene	-		18	18	U												
638-02-8	2,5-Dimethylthiophene	-		23	23	U												
872-55-9	2-Ethylthiophene	-		23	23	U												
110-81-6	Diethyl Disulfide	-		12	12	U												

Notes:

µg/m³ = micrograms per cubic meter

Qual = Lab Qualifier

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

U = Compound was analyzed for, but not detected above the laboratory reporting limit.

- = Regional Screening Level (RSL) does not exist for this parameter.

RSLs are the residential values published May 2012,

http://www.epa.gov/reg3hwmd/risk/human/rbconcentration_table/index.htm

CAS	Parameter	Regional Screening Level µg/m³	Sample Location	PZAA-C2			PZAA-C3			PZAA-C3				
			Field Sample ID	PZAA-C2c-072012			PZAA-C3a-072012			PZAA-C3b-072012				
			Sample Date	7/19/2012			7/19/2012			7/19/2012				
			Sample Type	Regular			Regular			Regular				
			Units	µg/m³			µg/m³			µg/m³				
			Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual
7783-06-4	HYDROGEN SULFIDE	2.1	7	7	U	7	7	U	7	7	U	7	7	U
463-58-1	Carbonyl Sulfide	-	12	12	U	12	12	U	12	12	U	12	12	U
74-93-1	Methyl Mercaptan	-	9.8	9.8	U	9.8	9.8	U	9.8	9.8	U	9.8	9.8	U
75-08-1	Ethyl Mercaptan	-	13	13	U	13	13	U	13	13	U	13	13	U
75-18-3	Dimethyl Sulfide	-	13	13	U	13	13	U	13	13	U	13	13	U
75-15-0	CARBON DISULFIDE	730	7.8	7.8	U	7.8	7.8	U	7.8	7.8	U	7.8	7.8	U
75-33-2	Isopropyl Mercaptan	-	16	16	U	16	16	U	16	16	U	16	16	U
75-66-1	tert-Butyl Mercaptan	-	18	18	U	18	18	U	18	18	U	18	18	U
107-03-9	n-Propyl Mercaptan	-	16	16	U	16	16	U	16	16	U	16	16	U
624-89-5	Ethyl Methyl Sulfide	-	16	16	U	16	16	U	16	16	U	16	16	U
110-02-1	Thiophene	-	17	17	U	17	17	U	17	17	U	17	17	U
513-44-0	Isobutyl Mercaptan	-	18	18	U	18	18	U	18	18	U	18	18	U
352-93-2	Diethyl Sulfide	-	18	18	U	18	18	U	18	18	U	18	18	U
109-79-5	n-Butyl Mercaptan	-	18	18	U	18	18	U	18	18	U	18	18	U
624-92-0	METHYL DISULFIDE	-	9.6	9.6	U	9.6	9.6	U	9.6	9.6	U	9.6	9.6	U
616-44-4	3-Methylthiophene	-	20	20	U	20	20	U	20	20	U	20	20	U
110-01-0	Tetrahydrothiophene	-	18	18	U	18	18	U	18	18	U	18	18	U
638-02-8	2,5-Dimethylthiophene	-	23	23	U	23	23	U	23	23	U	23	23	U
872-55-9	2-Ethylthiophene	-	23	23	U	23	23	U	23	23	U	23	23	U
110-81-6	Diethyl Disulfide	-	12	12	U	12	12	U	12	12	U	12	12	U

Notes:

µg/m³ = micrograms per cubic meter

Qual = Lab Qualifier

MRL = Method Reporting Limit - The minimum quantity of a target analyte that

U = Compound was analyzed for, but not detected above the laboratory reporti

- = Regional Screening Level (RSL) does not exist for this parameter.

RSLs are the residential values published May 2012,

http://www.epa.gov/reg3hwmd/risk/human/rbconcentration_table/index.htm

Sample Location	PZAA-C3		
Sample ID	PZAA-C3-072012		
Sample Date	7/20/2012		
Units	mg/sample	mg/sample	mg/m ³
	Result	MRL	Air Volume
Particulate as PM ₁₀	ND	1	<0.64

Notes:

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined.

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

mg = milligrams

mg/m³ = milligrams per cubic meter

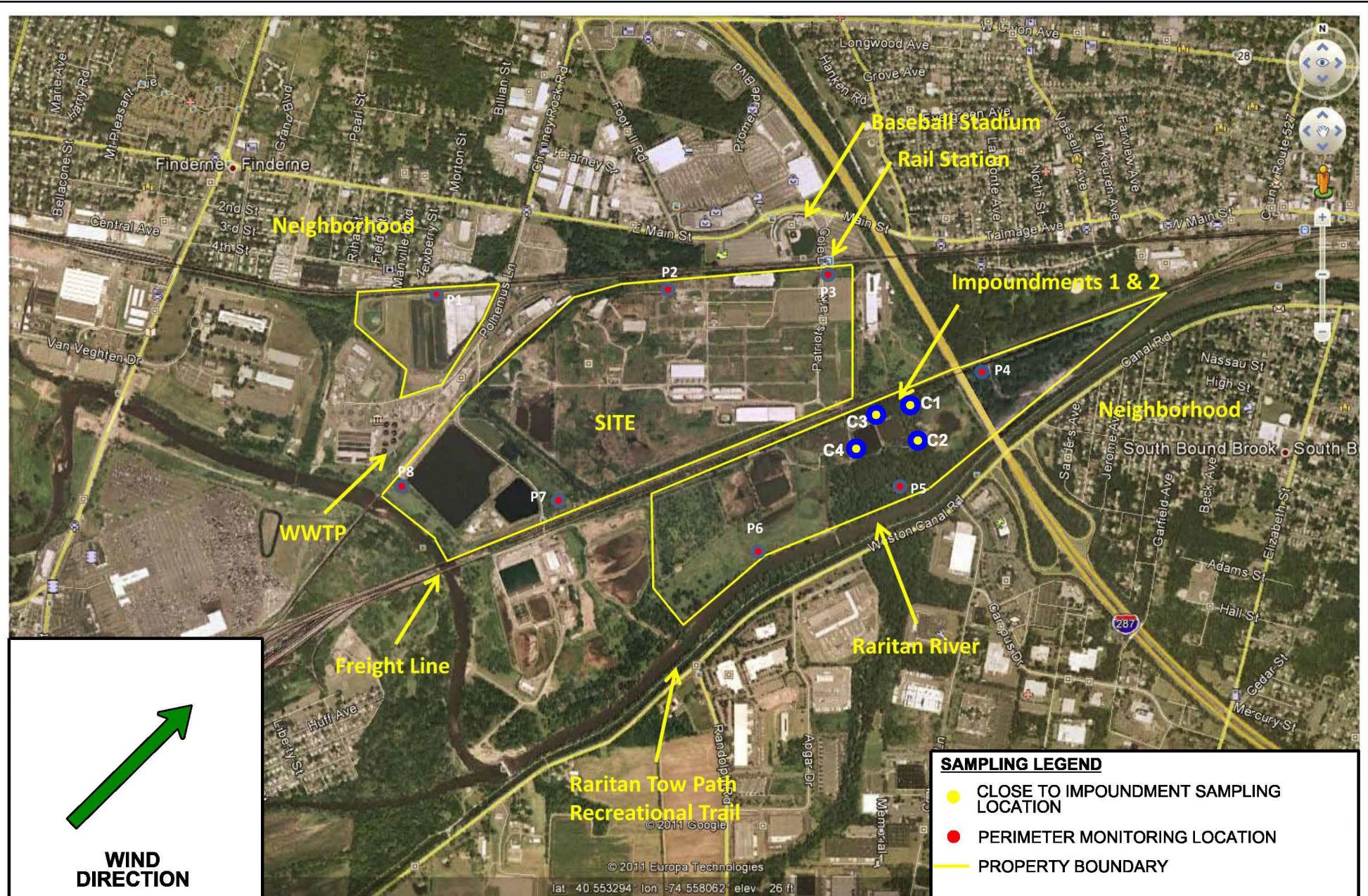
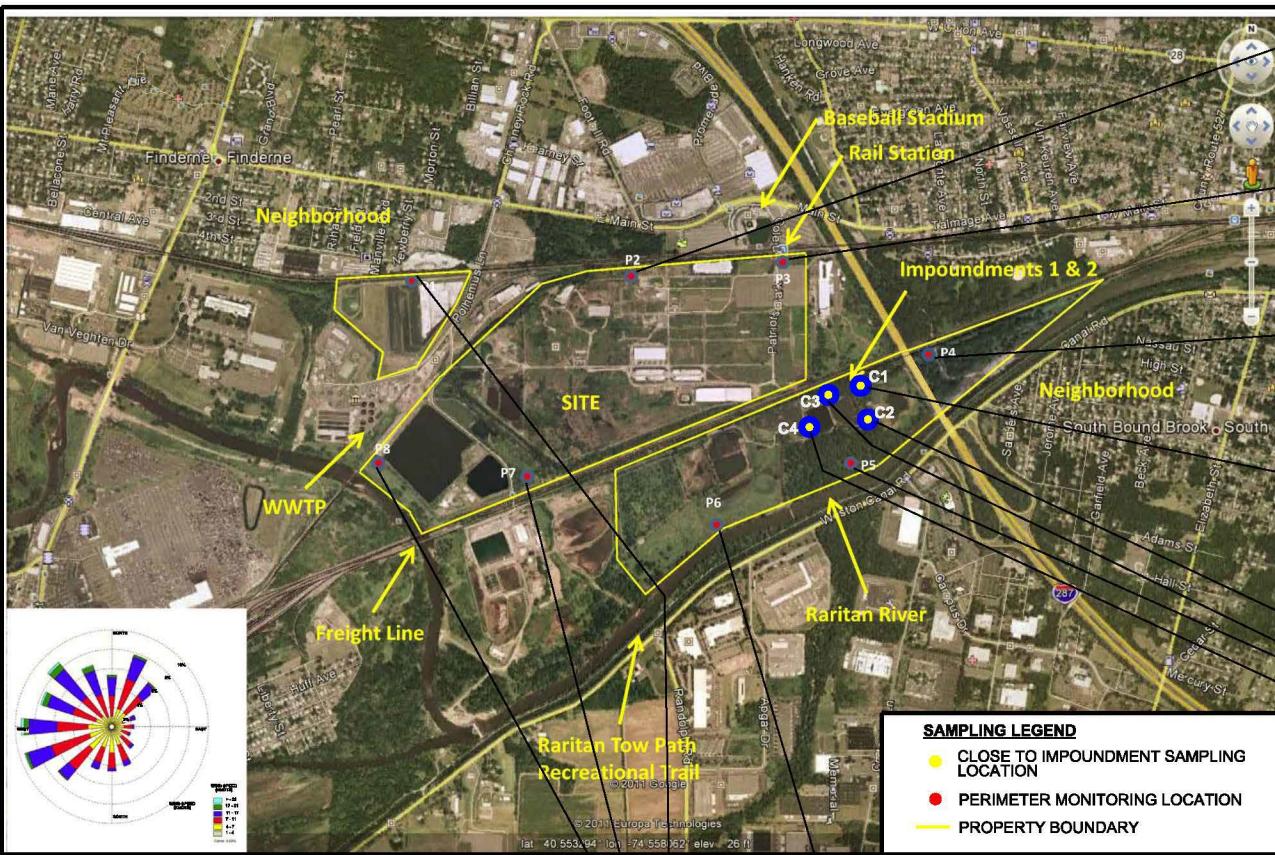


Figure 1
Ambient Air Monitoring Locations
American Cyanamid Superfund Site
Bridgewater, New Jersey

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P2						
	Analyte (Results in $\mu\text{g}/\text{m}^3$)					
	1,3-Butadiene	Benzene	Toluene	Ethylbenzene	m,p-Xylenes	o-Xylene
RSL	0.081	0.31	3100	0.97	100	100
7/20/12	<0.081	0.55	3.0	1.1	4.3	0.77

P3						
	Analyte (Results in $\mu\text{g}/\text{m}^3$)					
	1,3-Butadiene	Benzene	Toluene	Ethylbenzene	m,p-Xylenes	o-Xylene
RSL	0.081	0.31	3100	0.97	100	100
7/20/12	<0.061	1.0	4.3	1.6	5.7	0.99

P4						
	Analyte (Results in $\mu\text{g}/\text{m}^3$)					
	1,3-Butadiene	Benzene	Toluene	Ethylbenzene	m,p-Xylenes	o-Xylene
RSL	0.081	0.31	3100	0.97	100	100
7/20/12	<0.081	0.84	4.6	0.83	2.2	1.0

C1						
	Analyte (Results in $\mu\text{g}/\text{m}^3$)					
	1,3-Butadiene	Benzene	Toluene	Ethylbenzene	m,p-Xylenes	o-Xylene
RSL	0.081	0.31	3100	0.97	100	100
7/20/12	<0.081	0.82	3.9	1.3	4.8	0.90

C2						
	Analyte (Results in $\mu\text{g}/\text{m}^3$)					
	1,3-Butadiene	Benzene	Toluene	Ethylbenzene	m,p-Xylenes	o-Xylene
RSL	0.081	0.31	3100	0.97	100	100
7/20/12	<0.081	1.0	3.5	1.1	4.0	<100

C3						
	Analyte (Results in $\mu\text{g}/\text{m}^3$)					
	1,3-Butadiene	Benzene	Toluene	Ethylbenzene	m,p-Xylenes	o-Xylene
RSL	0.081	0.31	3100	0.97	100	100
7/20/12	<0.081	1.3	3.2	0.88	3.1	<100

P5						
	Analyte (Results in $\mu\text{g}/\text{m}^3$)					
	1,3-Butadiene	Benzene	Toluene	Ethylbenzene	m,p-Xylenes	o-Xylene
RSL	0.081	0.31	3100	0.97	100	100
7/20/12	0.34	0.90	4.6	0.79	1.9	0.92

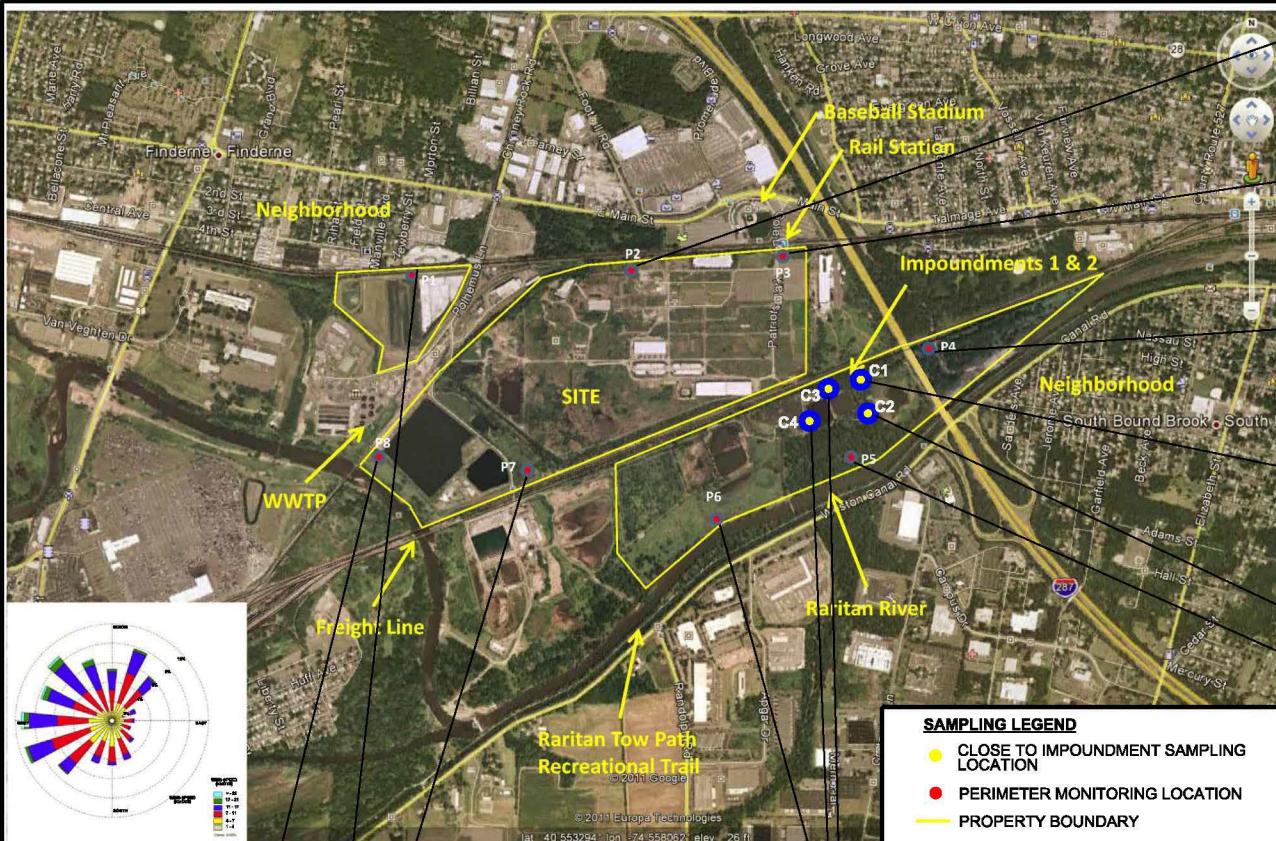
C4						
	Analyte (Results in $\mu\text{g}/\text{m}^3$)					
	1,3-Butadiene	Benzene	Toluene	Ethylbenzene	m,p-Xylenes	o-Xylene
RSL	0.081	0.31	3100	0.97	100	100
7/20/12	<0.081	5.3	3.8	0.89	3.3	0.73

Notes

1. $\mu\text{g}/\text{m}^3$ = micrograms per cubic meter
2. Qual = Lab Qualifier
3. MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.
4. ND = Compound was analyzed for, but not detected above the laboratory reporting limit.
5. M1 = Matrix Interference due to coelution with a non-target compound; results may be biased high
6. — = Regional Screening Level (RSL) does not exist for this parameter.
7. Yellow highlight = Exceedance of the RSL
8. RSLs are the residential values published May 2012 (http://www.epa.gov/reg3hwmf/risk/human/rbconcentration_table/index.htm)

Figure 2
Pfizer Quarterly Ambient Air Sample Results
(1,3-Butadiene, BTEX)
American Cyanamid Superfund Site
Bridgewater, New Jersey

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P8		
	Analyte (Results in $\mu\text{g}/\text{m}^3$)	
	Chloroform	Carbon Tetrachloride
RSL	0.11	0.41
7/20/12	0.27	0.50

P6		
	Analyte (Results in $\mu\text{g}/\text{m}^3$)	
	Chloroform	Carbon Tetrachloride
RSL	0.11	0.41
7/20/12	0.23	0.48

P1		
	Analyte (Results in $\mu\text{g}/\text{m}^3$)	
	Chloroform	Carbon Tetrachloride
RSL	0.11	0.41
7/20/12	0.17	0.53

P7		
	Analyte (Results in $\mu\text{g}/\text{m}^3$)	
	Chloroform	Carbon Tetrachloride
RSL	0.11	0.41
7/20/12	0.17	0.45

P2		
	Analyte (Results in $\mu\text{g}/\text{m}^3$)	
	Chloroform	Carbon Tetrachloride
RSL	0.11	0.41
7/20/12	0.27	0.51

P3		
	Analyte (Results in $\mu\text{g}/\text{m}^3$)	
	Chloroform	Carbon Tetrachloride
RSL	0.11	0.41
7/20/12	0.18	0.62

P4		
	Analyte (Results in $\mu\text{g}/\text{m}^3$)	
	Chloroform	Carbon Tetrachloride
RSL	0.11	0.41
7/20/12	0.18	0.46

C1		
	Analyte (Results in $\mu\text{g}/\text{m}^3$)	
	Chloroform	Carbon Tetrachloride
RSL	0.11	0.41
7/20/12	0.18	0.47

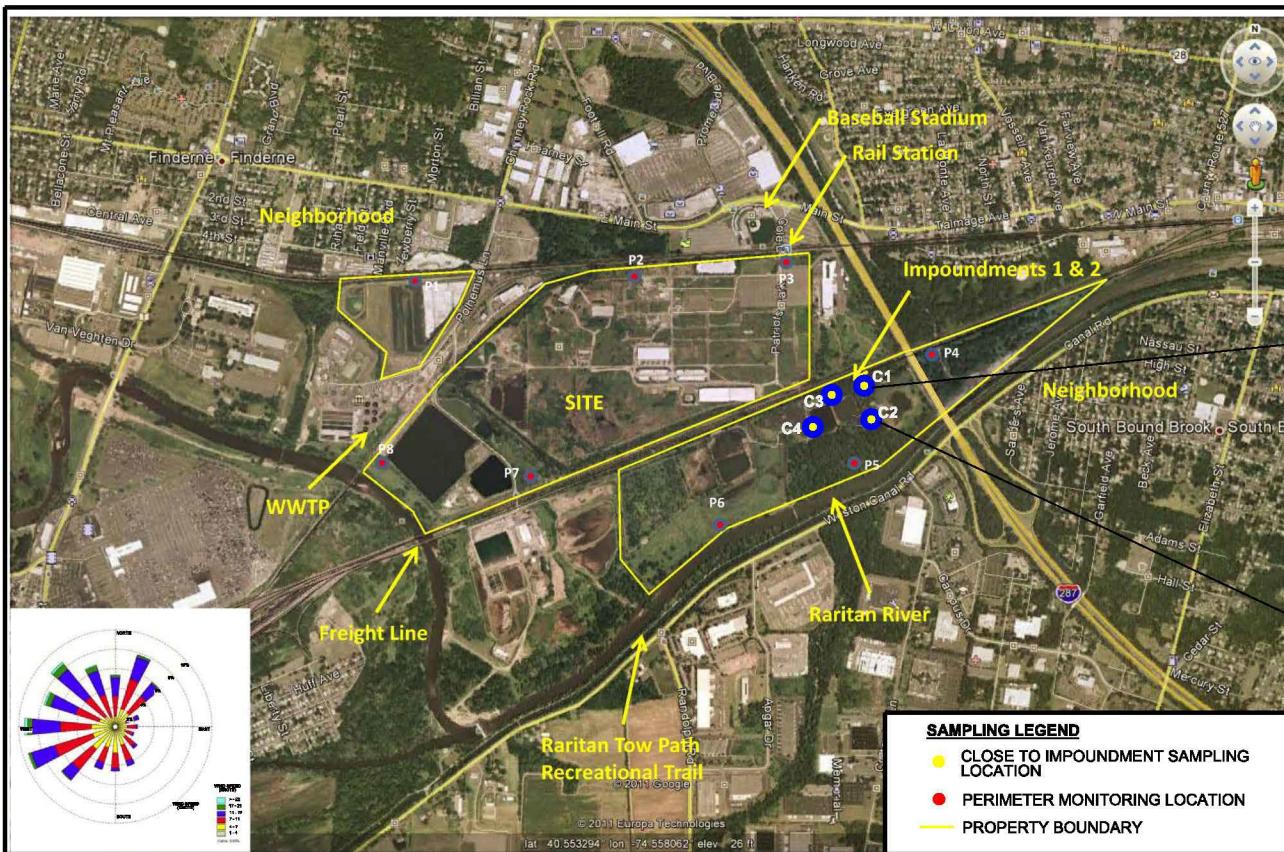
C2		
	Analyte (Results in $\mu\text{g}/\text{m}^3$)	
	Chloroform	Carbon Tetrachloride
RSL	0.11	0.41
7/20/12	0.18	0.46

P5		
	Analyte (Results in $\mu\text{g}/\text{m}^3$)	
	Chloroform	Carbon Tetrachloride
RSL	0.11	0.41
7/20/12	0.19	0.45

Notes

1. $\mu\text{g}/\text{m}^3$ = micrograms per cubic meter
2. Qual = Lab Qualifier
3. MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.
4. ND = Compound was analyzed for, but not detected above the laboratory reporting limit.
5. M1 = Matrix interference due to coelution with a non-target compound; results may be biased high
6. - = Regional Screening Level (RSL) does not exist for this parameter.
7. Yellow highlight = Exceedance of the RSL
8. RSLs are the residential values published May 2012 (http://www.epa.gov/reg3hwmd/risk/human/rbconcentration_table/index.htm)

Figure 3
Pfizer Quarterly Ambient Air Sample Results
(Chloroform and Carbon Tetrachloride)
American Cyanamid Superfund Site
Bridgewater, New Jersey



Notes

1. $\mu\text{g}/\text{m}^3$ = micrograms per cubic meter
2. Qual = Lab Qualifier
3. MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.
4. ND = Compound was analyzed for, but not detected above the laboratory reporting limit.
5. M1 = Matrix interference due to coelution with a non-target compound; results may be biased high
6. – = Regional Screening Level (RSL) does not exist for this parameter.
7. Yellow highlight = Exceedance of the RSL
8. RSLs are the residential values published May 2012 (http://www.epa.gov/reg3hwmd/risk/human/rbcconcentration_table/index.htm)

Figure 4
Pfizer Quarterly Ambient Air Sample Results (Formaldehyde and Acetaldehyde)
American Cyanamid Superfund Site
Bridgewater, New Jersey

CH2MHILL

DRAFT Summary of Ambient Air Monitoring Results, October 2012 Sampling Event, Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgewater, New Jersey

PREPARED FOR: Pfizer

PREPARED BY: CH2M HILL

DATE: December 14, 2012

Introduction

This technical memorandum presents the results for the ambient air monitoring program for Impoundments 1 and 2 of the American Cyanamid Superfund Site in Bridgewater Township, New Jersey (Site). The results presented here were from the second ambient air sampling event, performed on October 24-25, 2012. The results from the first sampling event, performed July 19-20, 2012, are reported in a separate technical memorandum. The overall objective of this program is to develop a baseline set of ambient air monitoring data prior to remedy implementation to identify potential air quality impact during remedial actions at Impoundments 1 and 2. Air sampling was conducted using the methods described in the *Ambient Air Monitoring Quality Assurance Project Plan* (May 2012).

Summary of Analytical Results

The analytical results are presented in the following tables:

- Volatile organic compounds (VOCs) analyzed using United States Environmental Protection Agency (USEPA) Method TO-15 are presented in Table 1.
- Aldehydes analyzed using USEPA Method TO-11A and polycyclic aromatic hydrocarbons (PAHs) analyzed using USEPA Method TO-13A are presented in Table 2.
- Reduced sulfur compounds analyzed using American Society for Testing and Materials (ASTM) Method 5504-08 are presented in Table 3.
- Particulate matter finer than 10 um in diameter (PM10) analyzed using gravimetric methods are presented in Table 4.

VOCs. Benzene, 1,3-butadiene, carbon tetrachloride, chloroform, ethylbenzene, and 1,4-dichlorobenzene were detected at concentrations above their respective USEPA Regional Screening Levels (RSLs) in air in at least one sample. The benzene, ethylbenzene and 1,3-butadiene results at each sampling location are shown in Figure 1. The carbon tetrachloride, chloroform and 1,4-dichlorobenzene results are shown in Figure 2.

Aldehydes. Formaldehyde and acetaldehyde were detected at concentrations above the RSLs in three samples collected near Impoundments 1 and 2. These results are shown in Figure 3. Benzaldehyde, hexanal and 2,5-dimethylbenzaldehyde also were detected at concentrations near their analytical reporting limits. There are no RSL values available for these three compounds.

PAHs. Naphthalene was detected in a single perimeter sample, and in a single close-in sample (near the impoundments) above the RSL.

Particulate Matter. Particulate matter was detected near the impoundments at 1 mg/m³.

Analytes not detected. Reduced sulfur compounds (including hydrogen sulfide) were not detected in any samples.

Weather Conditions

Winds were generally light (1 to 4 miles per hour) and from the north/northeast and the east during the sampling event, based on information obtained from an on-site meteorological station and a wind rose developed from the National Weather Service station located at the Newark Airport.

Discussion

The analytical results from the October 2012 sampling event were also compared with background levels in urban air. Urban air toxics monitoring is performed in four urban locations in New Jersey under the USEPA Urban Air Toxics Monitoring Program (UATMP). The most recently available UATMP monitoring data (USEPA, 2011, presenting data from 2008 and 2009) were used for this comparison. The New Jersey monitoring sites are located in Camden, Chester, Elizabeth and New Brunswick. Analytical results from the July 2012 sampling event were compared with the reported daily average; the daily average of a particular pollutant is the average concentration of all measured detections from sampling events performed by EPA in a year. The results from this comparison are shown in Table 5, and are discussed below in further detail:

- Concentrations of formaldehyde, acetaldehyde and carbon tetrachloride detected during the July 2012 sampling event were indistinguishable from the daily average urban background concentrations.
- The maximum benzene concentration (33 ug/m^3) was detected at Station C4, near the impoundments. Benzene concentrations are much lower at all of the other sampling locations. Concentrations of benzene at most perimeter sampling locations were only slightly higher than the daily urban background concentrations. All benzene concentrations around the impoundments were lower than the maximum urban background concentration for benzene (34.1 ug/m^3) reported in the UATMP.
- Ethylbenzene was not detected at the perimeter stations, with the exception of Station P3, across from the Rail Station. Ethylbenzene was detected at Station P3 at a higher concentration (7.5 ug/m^3) than the highest concentration detected next to the impoundments (5.5 ug/m^3 , in Station C4). In addition, Station P3 is located to the north and upwind from the impoundments. These two lines of evidence suggest that the detected concentration of ethylbenzene at Station P3 is unrelated to the impoundments. With the exception of the concentration detected at Station C4, ethylbenzene concentrations are slightly higher than daily average urban background around the impoundments. With the exception of the result at Station P3, all ethylbenzene concentrations are lower than the maximum background concentration (7.2 ug/m^3) reported in the UATMP.
- 1,3-Butadiene was detected uniformly in all samples (from perimeter and close-in stations). Concentrations are higher than the daily average urban background concentration, but are lower than the maximum background concentration (3.5 ug/m^3) reported in the UATMP.
- Chloroform and carbon tetrachloride concentrations were slightly higher than the daily average urban background concentrations, but appear to be uniformly distributed across all of the sampling locations (both near the impoundments and at the perimeter, both upwind and downwind). All chloroform concentrations are lower than the maximum background concentration (7.6 ug/m^3), and all carbon tetrachloride concentrations are lower than the maximum background concentration (1.4 ug/m^3) reported in the UATMP.
- 1,4-dichlorobenzene had not been detected in the July 2012 sampling event but was detected at each station in October 2012. Concentrations detected in most stations were slightly higher than the daily average urban background published in the UATMP. Concentrations of 1,4-dichlorobenzene are uniformly distributed in air sample collected from the monitoring stations, with the exception of Station C4. Concentrations in all samples are less than the maximum background concentration (7.6 ug/m^3) reported in the UATMP.
- Naphthalene was detected in a single perimeter sample (2.2 ug/m^3 at Station P3), and in a single close-in sample (3 ug/m^3 , at Station C4), with USEPA Method TO-15. However, it was not detected in any other

samples, nor was detected in any of the close-in stations (near the impoundments) using EPA Method TO-13A.

- Formaldehyde and acetaldehyde concentrations detected in samples around the impoundments are similar to daily urban background concentrations.

Based on this evaluation, the concentrations of analytes detected at the perimeter of the facility during the October 2012 are not distinguishable from concentrations normally present in ambient air in urban areas, with the exception of ethylbenzene and naphthalene detected at Station P3. Station P3 is located upwind from the impoundments, and detected concentrations are unlikely to be associated with the impoundments.

Concentrations of selected analytes around the impoundments, particularly at one station (Station C4) were higher than the daily urban background levels, but were lower than maximum background levels. However, concentrations at this close-in location will be evaluated in subsequent sampling events.

References

U.S. Environmental Protection Agency. 2011. *2008-2009 National Monitoring Programs (UATMP, NATTS and CSATAM), Volume I*. Office of Air Quality Planning and Standards. USEPA-454/R-11-013a. December.

Table 1
 Volatile Organic Compounds (VOCs) Analyzed Using EPA Method TO-15
 October 2012 Ambient Air Monitoring Event
 Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgewater, New Jersey

CAS#	Parameter	Regional Screening Level µg/m³	Sample Location			PZAA-P1			PZAA-P2			PZAA-P3			PZAA-P4			PZAA-P5			PZAA-P6			PZAA-P7					
			Field Sample ID			PZAA-P1-102412			PZAA-P2-102412			PZAA-P3-102412			PZAA-P4-102412			PZAA-P5-102412			PZAA-P6-102412			PZAA-P7-102412					
			Sample Date			10/24/2012			10/24/2012			10/24/2012			10/24/2012			10/24/2012			10/24/2012			10/24/2012					
			Sample Type			Regular			Regular			Regular			Regular			Regular			Regular			Regular					
			Units			µg/m³			µg/m³			µg/m³			µg/m³			µg/m³			µg/m³			µg/m³					
Result		MRL			Qual			Result			MRL			Result			MRL			Result			MRL			Result			
115-07-1	Propene	-			4.2			0.70			=			15			0.74			=			6.0			0.75			
75-71-8	Dichlorodifluoromethane (CFC 12)	100			2.0			0.70			=			2.1			0.74			=			2.0			0.75			
74-87-3	Chloromethane	94			0.52			0.28			=			0.67			0.29			=			0.59			0.3			
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	-			ND			0.70			U			ND			0.74			U			ND			0.75			
75-01-4	Vinyl Chloride	0.16			ND			0.14			U			ND			0.15			U			ND			0.15			
106-99-0	1,3-Butadiene	0.081			0.4			0.28			=			0.61			0.29			=			0.48			0.3			
74-83-9	Bromomethane	5.2			ND			0.14			U			ND			0.15			U			ND			0.15			
75-00-3	Chloroethane	10,000			ND			0.14			U			ND			0.15			U			ND			0.15			
64-17-5	Ethanol	-			45			7.0			=			59			7.4			=			59			7.5			
75-05-8	Acetonitrile	-			0.82			0.70			=			1.3			0.74			=			0.98			0.75			
107-02-8	Acrolein	-			6.2			2.8			=			13			2.9			=			9.3			3			
67-64-1	Acetone	32,000			170			7.0			=			330			7.4			=			210			7.5			
75-69-4	Trichlorofluoromethane	730			2.40			0.14			=			1.3			0.15			=			1.3			0.15			
67-63-0	2-Propanol (Isopropyl Alcohol)	-			12			7.0			=			74			7.4			=			15			7.5			
107-13-1	Acrylonitrile	-			ND			0.70																					

Table 1
 Volatile Organic Compounds (VOCs) Analyzed Using EPA Method TO-15
 October 2012 Ambient Air Monitoring Event
 Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgewater, New Jersey

CAS#	Parameter	Regional Screening Level µg/m³	Sample Location			PZAA-P1			PZAA-P2			PZAA-P3			PZAA-P4			PZAA-P5			PZAA-P6			PZAA-P7		
			Field Sample ID			PZAA-P1-102412			PZAA-P2-102412			PZAA-P3-102412			PZAA-P4-102412			PZAA-P5-102412			PZAA-P6-102412			PZAA-P7-102412		
			Sample Date			10/24/2012			10/24/2012			10/24/2012			10/24/2012			10/24/2012			10/24/2012			10/24/2012		
			Sample Type			Regular			Regular			Regular			Regular			Regular			Regular			Regular		
			Units			µg/m³			µg/m³			µg/m³			µg/m³			µg/m³			µg/m³			µg/m³		
Result		MRL			Qual			Result			MRL			Result			MRL			Result			MRL			
79-00-5	1,1,2-Trichloroethane	0.15			ND			0.14			U			ND			0.15			U			ND			
108-88-3	Toluene	3,100			5.5			0.70			=			5.5			0.74			=			51			
591-78-6	2-Hexanone	31			1.4			0.70			=			1.9			0.74			=			ND			
124-48-1	Dibromochloromethane	0.09			ND			0.14			U			ND			0.15			U			ND			
106-93-4	1,2-Dibromoethane	0.0041			ND			0.14			U			ND			0.15			U			ND			
123-86-4	n-Butyl Acetate	-			ND			0.70			U			0.74			=			1.3			0.75			
111-65-9	n-Octane	-			1.0			0.70			=			1.0			0.74			=			5.9			
127-18-4	Tetrachloroethene	9.4			0.29			0.14			=			0.19			0.15			U			0.15			
108-90-7	Chlorobenzene	52			ND			0.14			U			ND			0.15			U			ND			
100-41-4	Ethylbenzene	0.97			0.87			0.70			=			0.91			0.74			=			7.5			
179601-23-1	m,p-Xylenes	100			2.7			0.70			=			2.9			0.74			=			6.0			
75-25-2	Bromoform	2.2			ND			0.70			U			ND			0.74			U			ND			
100-42-5	Styrene	1,000			0.71			0.70			=			ND			0.74			U			20			
95-47-6	o-Xylene	100			ND			0.70			U			ND			0.74			U			7.4			
111-84-2	n-Nonane	-			ND			0.70			U			ND			0.74			U			7.2			
79-34-5	1,1,2,2-Tetrachloroethane	0.042			ND			0.14			U			ND			0.15			U			ND			
98-82-8	Cumene	1,000			ND																					

Table 1
 Volatile Organic Compounds (VOCs) Analyzed Using EPA Method TO-15
 October 2012 Ambient Air Monitoring Event
 Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgewater, New Jersey

CAS#	Parameter	Regional Screening Level µg/m³	Sample Location			PZAA-P8			PZAA-C1			PZAA-C2			PZAA-C3			PZAA-C4					
			Field Sample ID			PZAA-P8-102412			PZAA-C1-102412			PZAA-C2-102412			PZAA-C3-102412			PZAA-C3-102412-D			PZAA-C4-102412		
			Sample Date			10/24/2012			10/24/2012			10/24/2012			10/24/2012			10/24/2012			10/24/2012		
			Sample Type			Regular			Regular			Regular			Regular			Duplicate			Regular		
			Units			µg/m³			µg/m³			µg/m³			µg/m³			µg/m³			µg/m³		
Result		MRL			Qual			Result			MRL			Qual			Result			MRL			Qual
115-07-1	Propene	-			5.0			0.75			=			3.6			0.78			=			4.0
75-71-8	Dichlorodifluoromethane (CFC 12)	100			2.6			0.75			=			2.7			0.78			=			2.6
74-87-3	Chloromethane	94			0.68			0.30			=			0.66			0.31			=			0.67
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	-			ND			0.75			U			ND			0.78			U			ND
75-01-4	Vinyl Chloride	0.16			ND			0.15			U			ND			0.16			U			ND
106-99-0	1,3-Butadiene	0.081			0.45			0.30			=			0.35			0.31			=			0.53
74-83-9	Bromomethane	5.2			ND			0.15			U			ND			0.16			U			ND
75-00-3	Chloroethane	10,000			ND			0.15			U			ND			0.16			U			ND
64-17-5	Ethanol	-			30			7.5			=			31			7.8			=			29
75-05-8	Acetonitrile	-			0.95			0.75			=			ND			0.78			=			1.0
107-02-8	Acrolein	-			8.8			3.0			=			4.5			3.1			=			4.9
67-64-1	Acetone	32,000			190			7.5			=			100			7.8			=			110
75-69-4	Trichlorofluoromethane	730			1.6			0.15			=			7.9			0.16			=			1.5
67-63-0	2-Propanol (Isopropyl Alcohol)	-			12.0			7.5			=			ND			7.8			U			8.3
107-13-1	Acrylonitrile	-			ND			0.75			U			ND			0.78			U			ND
75-35-4	1,1-Dichloroethene	210			ND			0.15			U			ND			0.16			U			ND
75-09-2	Methylene Chloride	96			2.5			0.75			=			2.3			0.78			=			2.8
107-05-1	3-Chloro-1-propene (Allyl Chloride)	-			ND			0.15			U			ND			0.16			U			ND
76-13-1	Trichlorotrifluoroethane	31,000			0.63			0.15			=			0.67			0.16			=			0.66
75-15-0	Carbon Disulfide	730			ND			7.5															

Table 1
 Volatile Organic Compounds (VOCs) Analyzed Using EPA Method TO-15
 October 2012 Ambient Air Monitoring Event
 Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgewater, New Jersey

CAS#	Parameter	Regional Screening Level µg/m³	Sample Location			PZAA-P8			PZAA-C1			PZAA-C2			PZAA-C3			PZAA-C4					
			Field Sample ID			PZAA-P8-102412			PZAA-C1-102412			PZAA-C2-102412			PZAA-C3-102412			PZAA-C3-102412-D			PZAA-C4-102412		
			Sample Date			10/24/2012			10/24/2012			10/24/2012			10/24/2012			10/24/2012			10/24/2012		
			Sample Type			Regular			Regular			Regular			Regular			Duplicate			Regular		
			Units			µg/m³			µg/m³			µg/m³			µg/m³			µg/m³			µg/m³		
						Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual									
79-00-5	1,1,2-Trichloroethane	0.15	ND	0.15	U	ND	0.16	U	ND	0.16	U	ND	0.16	U	ND	0.13	U	ND	0.16	U	ND	0.16	U
108-88-3	Toluene	3,100	6	0.75	=	6.0	0.78	=	7.3	0.76	=	6.7	0.78	=	6.8	0.67	=	31	0.76	=			
591-78-6	2-Hexanone	31	1.9	0.75	=	0.96	0.78	=	1.2	0.76	=	0.85	0.78	=	0.92	0.67	=	ND	0.76	U			
124-48-1	Dibromochloromethane	0.09	ND	0.15	U	ND	0.16	U	ND	0.16	U	ND	0.16	U	ND	0.13	U	ND	0.16	U			
106-93-4	1,2-Dibromoethane	0.0041	ND	0.15	U	ND	0.16	U	ND	0.16	U	ND	0.16	U	ND	0.13	U	ND	0.16	U			
123-86-4	n-Butyl Acetate	-	0.85	0.75	=	1.1	0.78	=	1.4	0.76	=	1.2	0.78	=	1.2	0.67	=	1.4	0.76	=			
111-65-9	n-Octane	-	1.0	0.75	=	0.89	0.78	=	1.0	0.76	=	0.85	0.78	=	0.89	0.67	=	3.5	0.76	=			
127-18-4	Tetrachloroethene	9.4	0.36	0.15	=	0.53	0.16	=	0.50	0.16	=	0.58	0.16	=	0.52	0.13	=	0.89	0.16	=			
108-90-7	Chlorobenzene	52	ND	0.15	U	ND	0.16	U	ND	0.16	U	ND	0.16	U	ND	0.13	U	0.56	0.16	=			
100-41-4	Ethylbenzene	0.97	0.97	0.75	=	0.97	0.78	=	0.98	0.76	=	0.94	0.78	=	0.99	0.67	=	5.5	0.76	=			
179601-23-1	m,p-Xylenes	100	3.2	0.75	=	3.3	0.78	=	3.3	0.76	=	3.2	0.78	=	3.3	0.67	=	6.5	0.76	=			
75-25-2	Bromoform	2.2	ND	0.75	U	ND	0.78	U	ND	0.76	U	ND	0.78	U	ND	0.67	U	ND	0.76	U			
100-42-5	Styrene	1,000	ND	0.75	U	ND	0.78	U	ND	0.76	U	ND	0.78	U	0.69	0.67	=	21	0.76	=			
95-47-6	o-Xylene	100	ND	0.75	U	0.89	0.78	=	0.82	0.76	=	0.91	0.78	=	0.85	0.67	=	6.5	0.76	=			
111-84-2	n-Nonane	-	ND	0.75	U	ND	0.78	U	ND	0.76	U	ND	0.78	U	ND	0.67	U	5.3	0.76	=			
79-34-5	1,1,2,2-Tetrachloroethane	0.042	ND	0.15	U	ND	0.16	U	ND	0.16	U	ND	0.16	U	ND	0.13	U	ND	0.16	U			
98-82-8	Cumene	1,000	ND	0.75	U	ND	0.78	U	ND	0.76	U	ND	0.78	U	ND	0.67	U	4.9	0.76	=			
80-56-8	alpha-Pinene	-	1.9	0.75	=	1.5	0.78	=	1.6	0.76	=	0.9	0.78	=	1.5	0.67	=	3.1	0.76	=			
103-65-1	n-Propylbenzene	1,000	ND	0.75	U	ND	0.78	U	ND	0.76	U	ND	0.78	U	ND	0.67	U	ND	0.76	U			
622-96-8	4-Ethyltoluene	-	ND	0.75	U	ND	0.78	U	ND	0.76	U	ND	0.78	U	ND	0.67	U	ND	0.76	U			
108-67-8	1,3,5-Trimethylbenzene	7.3	ND	0.75	U	ND	0.78	U	ND	0.76	U	ND	0.78	U	ND	0.67	U	0.78	0.76	=			
95-63-6	1,2,4-Trimethylbenzene	7.3	ND	0.75	U	ND	0.78	U	ND	0.76	U	ND	0.78	U	ND	0.67	U	2.8	0.76	=			
100-44-7	Benzyl Chloride	0.05	ND	0.75	U	ND	0.78	U	ND	0.76	U	ND	0.78	U	ND	0.67	U	ND	0.76	U			
541-73-1	1,3-Dichlorobenzene	210	ND	0.15	U	ND	0.16	U	ND	0.16	U	ND	0.16	U	ND	0.13	U	ND	0.16	U			
106-46-7	1,4-Dichlorobenzene	0.22	0.36	0.15	=	0.38	0.16	=	0.37	0.16	=	0.34	0.16	=	0.36	0.13	=	0.42	0.16	=			
95-50-1	1,2-Dichlorobenzene	210	ND	0.15	U	ND	0.16	U	ND	0.16	U	ND	0.16	U	ND	0.13	U	ND	0.16	U			
5989-27-5	d-Limonene	-	1.6	0.75	=	1.3	0.78	=	1.9	0.76	=	1.2	0.78	=	1.7	0.67	=	6.2	0.76	=			
96-12-8	1,2-Dibromo-3-chloropropane	-	ND	0.75	U	ND	0.78	U	ND	0.76	U	ND	0.78	U	ND	0.67	U	ND	0.76	U			
120-82-1	1,2,4-Trichlorobenzene	2.1	ND	0.75	U	ND	0.78	U	ND	0.76	U	ND	0.78	U	ND	0.67	U	ND	0.76	U			
91-20-3	Naphthalene	0.072	ND	0.75	U	ND	0.78	U	ND	0.76	U	ND	0.78	U	ND	0.67	U	3.0	0.76	=			
87-68-3	Hexachlorobutadiene	0.11	ND	0.75	U	ND	0.78	U	ND	0.76	U	ND	0.78	U	ND	0.67	U	ND	0.76	U			

Notes:

µg/m³ - micrograms per cubic meter

Qual - Lab Qualifier

MRL - Method Reporting Limit - The minimum quantity of a target analyte that can be detected by the method.

Table 2

Aldehydes (Analyzed Using EPA Method TO-11A) and Polycyclic Aromatic Hydrocarbons (Analyzed Using EPA Method TO-13A)

October 2012 Ambient Air Monitoring Event

Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgewater, New Jersey

CAS#	Parameter	Regional Screening Level µg/m³	PZAA-C1			PZAA-C2			PZAA-C3								
			Field Sample ID			Sample Date			Sample Type			Units					
			PZAA-C1-102412			PZAA-C2-102412			PZAA-C3-102412			PZAA-C3-102412-D					
			10/24/2012			10/24/2012			10/24/2012			10/24/2012					
			Regular			Regular			Regular			Duplicate					
			µg/m³			µg/m³			µg/m³			µg/m³					
			Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual			
50-00-0	Formaldehyde	0.19	1.1	0.058	M	0.38	0.056	=	0.54	0.055	BT	ND	0.055	U			
75-07-0	Acetaldehyde	1.1	1.4	0.058	BT	1	0.056	BT	0.86	0.055	BT	1.4	0.055	BT			
123-38-6	n-Propanal	8.3	ND	0.058	U	ND	0.056	U	ND	0.055	U	ND	0.055	U			
4170-30-3	Crotonaldehyde	-	ND	0.058	U	ND	0.056	U	ND	0.055	U	ND	0.055	U			
123-72-8	Butyraldehyde	-	ND	0.058	U	ND	0.056	U	ND	0.055	U	ND	0.055	U			
100-52-7	Benzaldehyde	-	0.074	0.058	=	ND	0.056	U	ND	0.055	U	ND	0.055	U			
590-86-3	3-Methylbutyraldehyde	-	ND	0.058	U	ND	0.056	U	ND	0.055	U	ND	0.055	U			
110-62-3	Valeraldehyde	-	ND	0.058	U	ND	0.056	U	ND	0.055	U	ND	0.055	U			
529-20-4	2-Methylbenzaldehyde	-	ND	0.058	U	ND	0.056	U	ND	0.055	U	ND	0.055	U			
NA	3-Methylbenzaldehyde + 4-Methylbenzaldehyde	-	ND	0.12	U	ND	0.11	U	ND	0.11	U	ND	0.11	U			
66-25-1	Hexanal	-	0.058	0.058	=	ND	0.056	U	ND	0.055	U	ND	0.055	U			
5779-94-2	2,5-dimethylbenzaldehyde	-	0.061	0.058	=	ND	0.056	U	ND	0.055	U	ND	0.055	U			
91-20-3	Naphthalene	0.072	ND	0.67	UJ	ND	0.68	UJ	ND	0.67	UJ	N/A					
208-96-8	Acenaphthylene	-	ND	0.067	UJ	ND	0.068	UJ	ND	0.067	UJ						
83-32-9	Acenaphthene	-	ND	0.067	U	ND	0.068	UU	ND	0.067	U						
86-73-7	Fluorene	-	ND	0.067	U	ND	0.068	UU	ND	0.067	U						
85-01-8	Phenanthrene	-	ND	0.067	U	ND	0.068	UU	ND	0.067	U						
120-12-7	Anthracene	-	ND	0.067	U	ND	0.068	UU	ND	0.067	U						
206-44-0	Fluoranthene	-	ND	0.067	U	ND	0.068	UU	ND	0.067	U						
129-00-0	Pyrene	-	ND	0.067	U	ND	0.068	UU	ND	0.067	U						
56-55-3	Benzo(a)anthracene	0.0087	ND	0.067	U	ND	0.068	UU	ND	0.067	U						
218-01-9	Chrysene	0.087	ND	0.067	U	ND	0.068	UU	ND	0.067	U						
205-99-2	Benzo(b)fluoranthene	0.0087	ND	0.067	U	ND	0.068	UU	ND	0.067	U						
207-08-9	Benzo(k)fluoranthene	0.0087	ND	0.067	U	ND	0.068	UU	ND	0.067	U						
50-32-8	Benzo(a)pyrene	0.00087	ND	0.067	U	ND	0.068	UU	ND	0.067	U						
193-39-5	Indeno(1,2,3-c,d)pyrene	0.0087	ND	0.067	U	ND	0.068	UU	ND	0.067	U						
53-70-3	Dibenz(a,h)anthracene	0.0008	ND	0.067	U	ND	0.068	UU	ND	0.067	U						
191-24-2	Benzo(g,h,i)perylene	-	ND	0.067	U	ND	0.068	UU	ND	0.067	U						
81103-79-9	Fluorene-d10	-	N/A			N/A			N/A								
1718-52-1	Pyrene-d10	-	N/A			N/A			N/A								

Notes:

µg/m³ = micrograms per cubic meter

Qual = Lab Qualifier

BT - Results indicated possible breakthrough; back section > 10% front section.

L - Laboratory control sample recovery outside the specified limits, result may be biased low.

M - Matrix interference; results may be biased high

MRL - Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

N/A - Not Applicable

NA - Not Analyzed

ND - non-detect

U = Compound was analyzed for, but not detected above the laboratory reporting limit.

- Regional Screening Level (RSL) does not exist for this parameter.

Blue highlight signifies the exceedance of the RSL

EPA Regional Screening Levels referenced herein are the residential values published May 2012,

http://www.epa.gov/reg3hwmd/risk/human/rbconcentration_table/index.htm

Table 3

Reduced Sulfur Compounds Analyzed Using Method ASTM D 5504-08

October 2012 Ambient Air Monitoring Event

Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgewater, New Jersey

Sample Location Field Sample ID Sample Date Sample Type Units	PZAA-C1			PZAA-C1			PZAA-C1			PZAA-C1			PZAA-C2			
	PZAA-C1a-102412			PZAA-C1b-102412			PZAA-C1c-102412			PZAA-C1d-102412			PZAA-C2a-102412			
	10/24/2012			10/24/2012			10/24/2012			10/24/2012			10/24/2012			
	Regular			Regular			Regular			Regular			Regular			
	µg/m³			µg/m³			µg/m³			µg/m³			µg/m³			
CAS	Parameter	Regional Screening Level µg/m³			Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual
7783-06-4	Hydrogen Sulfide	2.1			ND	7	U	ND	7	U	ND	7	U	ND	7	U
463-58-1	Carbonyl Sulfide	-			ND	12	U	ND	12	U	ND	12	U	ND	12	U
74-93-1	Methyl Mercaptan	-			ND	9.8	U	ND	9.8	U	ND	9.8	U	ND	9.8	U
75-08-1	Ethyl Mercaptan	-			ND	13	U	ND	13	U	ND	13	U	ND	13	U
75-18-3	Dimethyl Sulfide	-			ND	13	U	ND	13	U	ND	13	U	ND	13	U
75-15-0	CARBON DISULFIDE	730			ND	7.8	U	ND	7.8	U	ND	7.8	U	ND	7.8	U
75-33-2	Isopropyl Mercaptan	-			ND	16	U	ND	16	U	ND	16	U	ND	16	U
75-66-1	tert-Butyl Mercaptan	-			ND	18	U	ND	18	U	ND	18	U	ND	18	U
107-03-9	n-Propyl Mercaptan	-			ND	16	U	ND	16	U	ND	16	U	ND	16	U
624-89-5	Ethyl Methyl Sulfide	-			ND	16	U	ND	16	U	ND	16	U	ND	16	U
110-02-1	Thiophene	-			ND	17	U	ND	17	U	ND	17	U	ND	17	U
513-44-0	Isobutyl Mercaptan	-			ND	18	U	ND	18	U	ND	18	U	ND	18	U
352-93-2	Diethyl Sulfide	-			ND	18	U	ND	18	U	ND	18	U	ND	18	U
109-79-5	n-Butyl Mercaptan	-			ND	18	U	ND	18	U	ND	18	U	ND	18	U
624-92-0	METHYL DISULFIDE	-			ND	9.6	U	ND	9.6	U	ND	9.6	U	ND	9.6	U
616-44-4	3-Methylthiophene	-			ND	20	U	ND	20	U	ND	20	U	ND	20	U
110-01-0	Tetrahydrothiophene	-			ND	18	U	ND	18	U	ND	18	U	ND	18	U
638-02-8	2,5-Dimethylthiophene	-			ND	23	U	ND	23	U	ND	23	U	ND	23	U
872-55-9	2-Ethylthiophene	-			ND	23	U	ND	23	U	ND	23	U	ND	23	U
110-81-6	Diethyl Disulfide	-			ND	12	U	ND	12	U	ND	12	U	ND	12	U

Notes:

µg/m³ = micrograms per cubic meter

Qual = Lab Qualifier

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

U = Compound was analyzed for, but not detected above the laboratory reporting limit.

- = Regional Screening Level (RSL) does not exist for this parameter.

RSLs are the residential values published May 2012,

http://www.epa.gov/reg3hwmd/risk/human/rbconcentration_table/index.htm

Table 3

Reduced Sulfur Compounds Analyzed Using Method ASTM D 5504-08

October 2012 Ambient Air Monitoring Event

Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgewater, Ne

Sample Location Field Sample ID Sample Date Sample Type Units	PZAA-C2			PZAA-C2			PZAA-C2			PZAA-C3		
	PZAA-C2b-102412			PZAA-C2c-102412			PZAA-C2d-102412			PZAA-C3a-102412		
	10/24/2012			10/24/2012			10/24/2012			10/24/2012		
	Regular			Regular			Regular			Regular		
	µg/m³			µg/m³			µg/m³			µg/m³		
CAS	Parameter	Regional Screening Level	µg/m³	Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual
7783-06-4	Hydrogen Sulfide	2.1		ND	7	U	ND	7	U	ND	7	UJ
463-58-1	Carbonyl Sulfide	–		ND	12	U	ND	12	U	ND	12	UJ
74-93-1	Methyl Mercaptan	–		ND	9.8	U	ND	9.8	U	ND	9.8	UJ
75-08-1	Ethyl Mercaptan	–		ND	13	U	ND	13	U	ND	13	UJ
75-18-3	Dimethyl Sulfide	–		ND	13	U	ND	13	U	ND	13	UJ
75-15-0	CARBON DISULFIDE	730		ND	7.8	U	ND	7.8	U	ND	7.8	UJ
75-33-2	Isopropyl Mercaptan	–		ND	16	U	ND	16	U	ND	16	UJ
75-66-1	tert-Butyl Mercaptan	–		ND	18	U	ND	18	U	ND	18	UJ
107-03-9	n-Propyl Mercaptan	–		ND	16	U	ND	16	U	ND	16	UJ
624-89-5	Ethyl Methyl Sulfide	–		ND	16	U	ND	16	U	ND	16	UJ
110-02-1	Thiophene	–		ND	17	U	ND	17	U	ND	17	UJ
513-44-0	Isobutyl Mercaptan	–		ND	18	U	ND	18	U	ND	18	UJ
352-93-2	Diethyl Sulfide	–		ND	18	U	ND	18	U	ND	18	UJ
109-79-5	n-Butyl Mercaptan	–		ND	18	U	ND	18	U	ND	18	UJ
624-92-0	METHYL DISULFIDE	–		ND	9.6	U	ND	9.6	U	ND	9.6	UJ
616-44-4	3-Methylthiophene	–		ND	20	U	ND	20	U	ND	20	UJ
110-01-0	Tetrahydrothiophene	–		ND	18	U	ND	18	U	ND	18	UJ
638-02-8	2,5-Dimethylthiophene	–		ND	23	U	ND	23	U	ND	23	UJ
872-55-9	2-Ethylthiophene	–		ND	23	U	ND	23	U	ND	23	UJ
110-81-6	Diethyl Disulfide	–		ND	12	U	ND	12	U	ND	12	UJ

Notes:

µg/m³ = micrograms per cubic meter

Qual = Lab Qualifier

MRL = Method Reporting Limit - The minimum quantity of a target analyte that

U = Compound was analyzed for, but not detected above the laboratory report

– = Regional Screening Level (RSL) does not exist for this parameter.

RSLs are the residential values published May 2012,

http://www.epa.gov/reg3hwmd/risk/human/rbconcentration_table/index.htm

Table 3

Reduced Sulfur Compounds Analyzed Using Method ASTM D 5504-08

October 2012 Ambient Air Monitoring Event

Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgewater, Ne

CAS	Parameter	Regional Screening Level $\mu\text{g}/\text{m}^3$	PZAA-C3			PZAA-C3			PZAA-C3		
			PZAA-C3b-102412			PZAA-C3c-102412			PZAA-C3d-102412		
			10/24/2012			10/24/2012			10/24/2012		
			Regular			Regular			Regular		
			$\mu\text{g}/\text{m}^3$			$\mu\text{g}/\text{m}^3$			$\mu\text{g}/\text{m}^3$		
			Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual
7783-06-4	Hydrogen Sulfide	2.1	ND	7	UJ	ND	7	UJ	ND	7	UJ
463-58-1	Carbonyl Sulfide	–	ND	12	UJ	ND	12	U	ND	12	UJ
74-93-1	Methyl Mercaptan	–	ND	9.8	UJ	ND	9.8	U	ND	9.8	UJ
75-08-1	Ethyl Mercaptan	–	ND	13	UJ	ND	13	U	ND	13	UJ
75-18-3	Dimethyl Sulfide	–	ND	13	UJ	ND	13	U	ND	13	UJ
75-15-0	CARBON DISULFIDE	730	ND	7.8	UJ	ND	7.8	U	ND	7.8	UJ
75-33-2	Isopropyl Mercaptan	–	ND	16	UJ	ND	16	U	ND	16	UJ
75-66-1	tert-Butyl Mercaptan	–	ND	18	UJ	ND	18	U	ND	18	UJ
107-03-9	n-Propyl Mercaptan	–	ND	16	UJ	ND	16	U	ND	16	UJ
624-89-5	Ethyl Methyl Sulfide	–	ND	16	UJ	ND	16	U	ND	16	UJ
110-02-1	Thiophene	–	ND	17	UJ	ND	17	U	ND	17	UJ
513-44-0	Isobutyl Mercaptan	–	ND	18	UJ	ND	18	U	ND	18	UJ
352-93-2	Diethyl Sulfide	–	ND	18	UJ	ND	18	U	ND	18	UJ
109-79-5	n-Butyl Mercaptan	–	ND	18	UJ	ND	18	U	ND	18	UJ
624-92-0	METHYL DISULFIDE	–	ND	9.6	UJ	ND	9.6	U	ND	9.6	UJ
616-44-4	3-Methylthiophene	–	ND	20	UJ	ND	20	U	ND	20	UJ
110-01-0	Tetrahydrothiophene	–	ND	18	UJ	ND	18	U	ND	18	UJ
638-02-8	2,5-Dimethylthiophene	–	ND	23	UJ	ND	23	U	ND	23	UJ
872-55-9	2-Ethylthiophene	–	ND	23	UJ	ND	23	U	ND	23	UJ
110-81-6	Diethyl Disulfide	–	ND	12	UJ	ND	12	U	ND	12	UJ

Notes:

 $\mu\text{g}/\text{m}^3$ = micrograms per cubic meter

Qual = Lab Qualifier

MRL = Method Reporting Limit - The minimum quantity of a target analyte that

U = Compound was analyzed for, but not detected above the laboratory report

– = Regional Screening Level (RSL) does not exist for this parameter.

RSLs are the residential values published May 2012,

http://www.epa.gov/reg3hwmd/risk/human/rbconcentration_table/index.htm

Table 4

PM 10 Analyzed Using Gravimetric Methods

October 2012 Ambient Air Monitoring Event

Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgewater, New Jersey

Sample Location	PZAA-C3		
Sample ID	PZAA-C3-102412		
Sample Date	10/24/2012		
Units	mg/sample	mg/sample	mg/m ³
	Result	MRL	Air Volume
Particulate as PM ₁₀	25	0.5	1

Notes:

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

mg = milligrams

mg/m³ = milligrams per cubic meter

Table 5

Comparison of Detected Analytes with Urban Background Concentrations

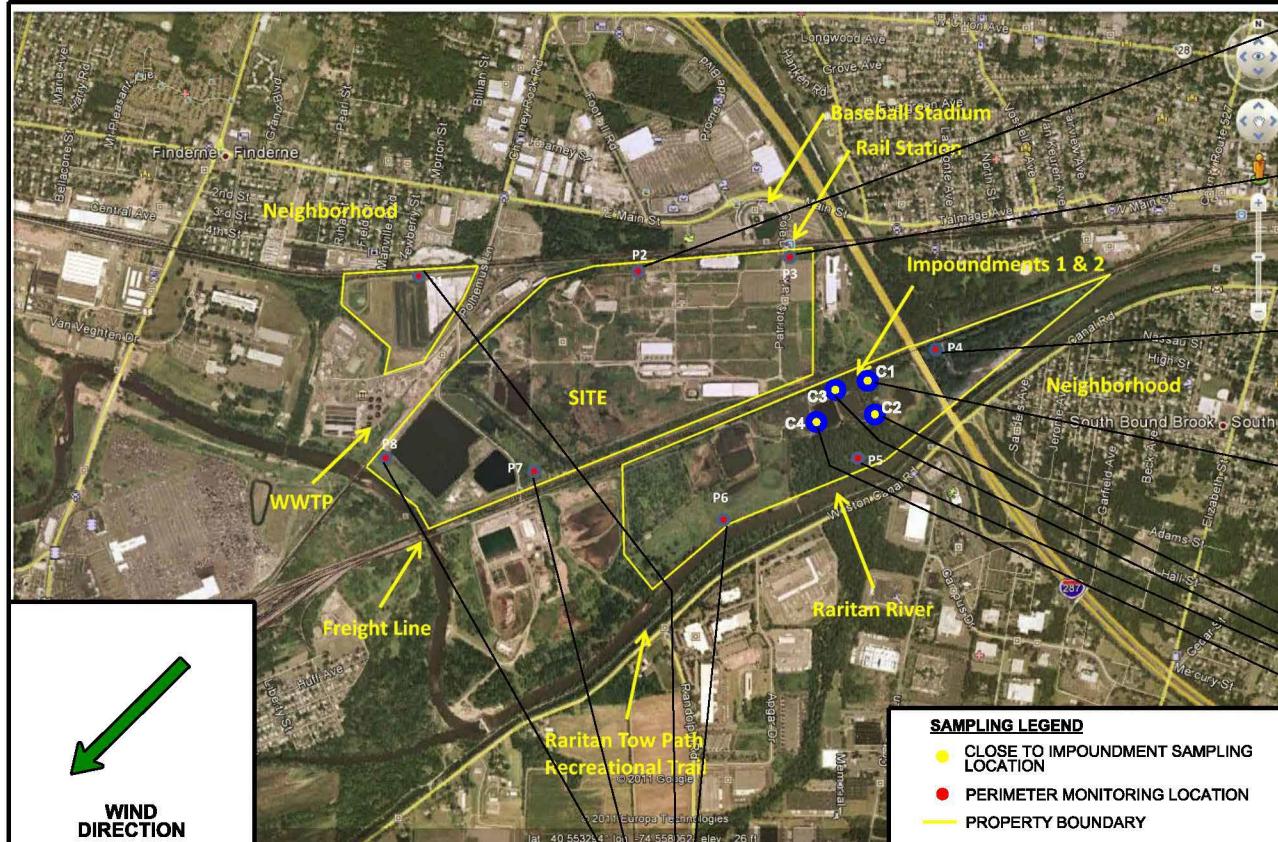
October 2012 Ambient Air Monitoring Event

Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgewater, New Jersey

Analyte	Range of Daily Average Urban Background Concentrations (ug/m ³)		Concentration Range Detected at the Bridgewater Site (ug/m ³)
	2008	2009	
Acetaldehyde	1.4 - 2.58	1.34 - 2.47	0.86 - 1.4
Benzene	0.56 - 1.36	0.6 - 1.83	1.6 - 33
1,3-Butadiene	0.04 - 0.15	0.03 - 0.16	0.4 - 0.63
Carbon tetrachloride	0.64 - 0.73	0.67 - 0.72	0.38 - 0.55
Chloroform	0.07 - 0.18	0.11 - 0.17	0.18 - 0.35
Formaldehyde	1.47 - 3.31	2.43 - 3.8	<0.055 - 1.1
Ethylbenzene	0.47 - 0.88	0.46	0.87 - 7.5
1,4-Dichlorobenzene	0.11 - 0.19	0.07 - 0.12	0.27 - 0.42

Notes:

Source for Daily Average Urban Background: Table 19-5, EPA, 2011.



P8						
Analyte (Results in $\mu\text{g}/\text{m}^3$)						
	1,3-Butadiene	Benzene	Toluene	Ethylbenzene	m,p-Xylenes	o-Xylene
RSL	0.081	0.31	3100	0.97	100	100
7/20/12	<0.081	0.69	3.5	1.3	5.0	0.88
10/24/12	0.45	2.5	*	*	*	*

P7						
Analyte (Results in $\mu\text{g}/\text{m}^3$)						
	1,3-Butadiene	Benzene	Toluene	Ethylbenzene	m,p-Xylenes	o-Xylene
RSL	0.081	0.31	3100	0.97	100	100
7/20/12	<0.081	0.60	2.1	<0.97	1.7	<100
10/24/12	0.45	2.5	*	*	*	*

Notes

1. $\mu\text{g}/\text{m}^3$ = micrograms per cubic meter
2. MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.
3. RSLs are the residential values published May 2012 (http://www.epa.gov/reg3hwmd/risk/human/reconcentration_table/index.htm)
4. * = Result less than reporting limit.

P2						
Analyte (Results in $\mu\text{g}/\text{m}^3$)						
	1,3-Butadiene	Benzene	Toluene	Ethylbenzene	m,p-Xylenes	o-Xylene
RSL	0.081	0.31	3100	0.97	100	100
7/20/12	<0.081	0.55	3.0	1.1	4.3	0.77
10/24/12	0.61	2.6	*	*	*	*

P3						
Analyte (Results in $\mu\text{g}/\text{m}^3$)						
	1,3-Butadiene	Benzene	Toluene	Ethylbenzene	m,p-Xylenes	o-Xylene
RSL	0.081	0.31	3100	0.97	100	100
7/20/12	<0.081	1.0	4.3	1.6	5.7	0.99
10/24/12	0.48	3.5	*	7.5	*	*

P4						
Analyte (Results in $\mu\text{g}/\text{m}^3$)						
	1,3-Butadiene	Benzene	Toluene	Ethylbenzene	m,p-Xylenes	o-Xylene
RSL	0.081	0.31	3100	0.97	100	100
7/20/12	<0.081	0.84	4.6	0.83	2.2	1.0
10/24/12	0.40	2.1	*	*	*	*

C1						
Analyte (Results in $\mu\text{g}/\text{m}^3$)						
	1,3-Butadiene	Benzene	Toluene	Ethylbenzene	m,p-Xylenes	o-Xylene
RSL	0.081	0.31	3100	0.97	100	100
7/20/12	<0.081	0.82	3.9	1.3	4.8	0.90
10/24/12	0.35	1.9	*	*	*	*

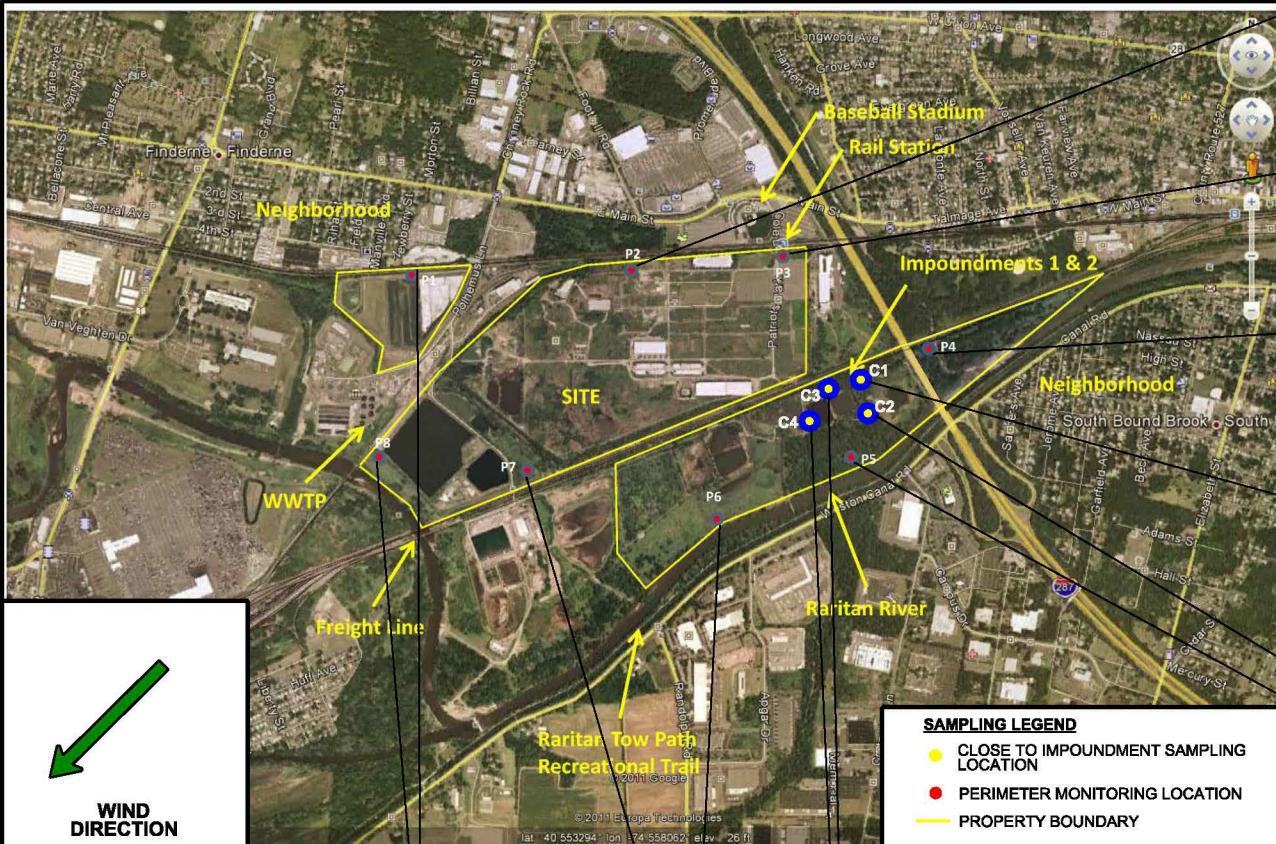
C2						
Analyte (Results in $\mu\text{g}/\text{m}^3$)						
	1,3-Butadiene	Benzene	Toluene	Ethylbenzene	m,p-Xylenes	o-Xylene
RSL	0.081	0.31	3100	0.97	100	100
7/20/12	<0.081	1.0	3.5	1.1	4.0	<100
10/24/12	0.54	3.2	*	0.98	*	*

C3						
Analyte (Results in $\mu\text{g}/\text{m}^3$)						
	1,3-Butadiene	Benzene	Toluene	Ethylbenzene	m,p-Xylenes	o-Xylene
RSL	0.081	0.31	3100	0.97	100	100
7/20/12	<0.081	1.3	3.2	0.88	3.1	<100
10/24/12	0.53	7.7	*	.99	*	*

P5						
Analyte (Results in $\mu\text{g}/\text{m}^3$)						
	1,3-Butadiene	Benzene	Toluene	Ethylbenzene	m,p-Xylenes	o-Xylene
RSL	0.081	0.31	3100	0.97	100	100
7/20/12	0.34	0.90	4.6	0.79	1.9	0.92
10/24/12	0.50	1.6	*	*	*	*

C4						
Analyte (Results in $\mu\text{g}/\text{m}^3$)						
	1,3-Butadiene	Benzene	Toluene	Ethylbenzene	m,p-Xylenes	o-Xylene
RSL	0.081	0.31	3100	0.97	100	100
7/20/12	<0.081	5.3	3.8	0.89	3.3	0.73
10/24/12	0.63	33	*	5.5	*	*

Figure 1
Pfizer Quarterly Ambient Air Sampling Results
(1,3-Butadiene, BTEX)
American Cyanamid Superfund Site
Bridgewater, New Jersey



P8				
Analyte (Results in µg/m³)				
	Chloroform	Carbon Tetrachloride	1,2-Dichloroethane	1,4-Dichlorobenzene
RSL	0.11	0.41	0.94	0.22
7/20/12	0.27	0.50	*	*
10/24/12	0.35	0.54	0.40	0.36

P1				
Analyte (Results in µg/m³)				
	Chloroform	Carbon Tetrachloride	1,2-Dichloroethane	1,4-Dichlorobenzene
RSL	0.11	0.41	0.94	0.22
7/20/12	0.17	0.53	*	*
10/24/12	0.18	0.43	0.31	0.35

Notes

1. µg/m³ = micrograms per cubic meter
2. MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.
3. RSLs are the residential values published May 2012 (http://www.epa.gov/reg3hwmd/fsk/human/rbcconcentration_table/index.htm)
4. * = Result less than reporting limit.

P2				
Analyte (Results in µg/m³)				
	Chloroform	Carbon Tetrachloride	1,2-Dichloroethane	1,4-Dichlorobenzene
RSL	0.11	0.41	0.94	0.22
7/20/12	0.27	0.51	*	*
10/24/12	0.28	*	0.53	0.31

P3				
Analyte (Results in µg/m³)				
	Chloroform	Carbon Tetrachloride	1,2-Dichloroethane	1,4-Dichlorobenzene
RSL	0.11	0.41	0.94	0.22
7/20/12	0.18	0.62	*	*
10/24/12	0.19	0.42	5.6	0.31

P4				
Analyte (Results in µg/m³)				
	Chloroform	Carbon Tetrachloride	1,2-Dichloroethane	1,4-Dichlorobenzene
RSL	0.11	0.41	0.94	0.22
7/20/12	0.18	0.46	*	*
10/24/12	0.23	0.44	0.38	0.27

C1				
Analyte (Results in µg/m³)				
	Chloroform	Carbon Tetrachloride	1,2-Dichloroethane	1,4-Dichlorobenzene
RSL	0.11	0.41	0.94	0.22
7/20/12	0.18	0.47	*	*
10/24/12	0.28	0.55	0.19	0.38

C2				
Analyte (Results in µg/m³)				
	Chloroform	Carbon Tetrachloride	1,2-Dichloroethane	1,4-Dichlorobenzene
RSL	0.11	0.41	0.94	0.22
7/20/12	0.18	0.46	*	*
10/24/12	0.24	0.43	0.23	0.37

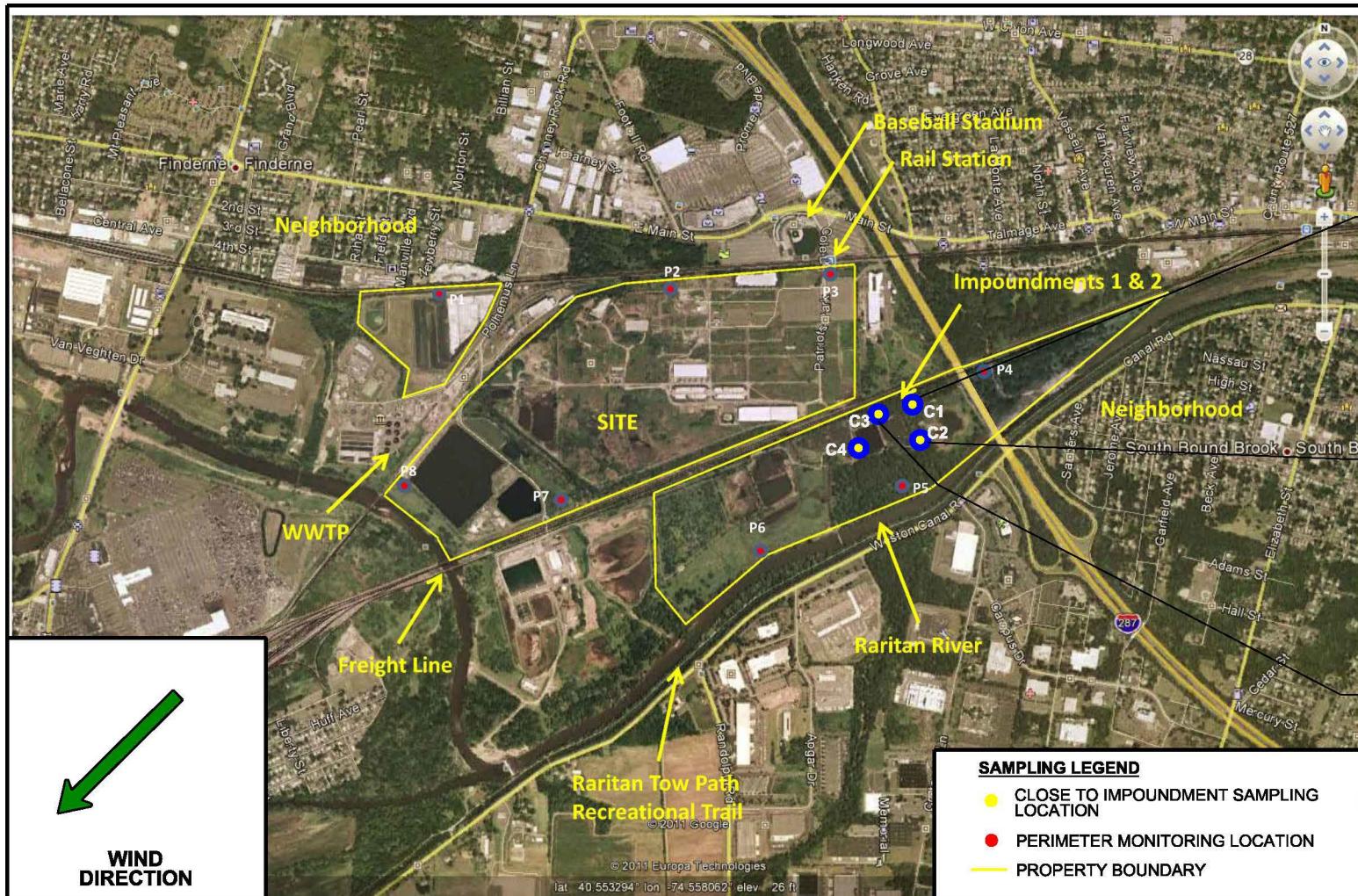
P5				
Analyte (Results in µg/m³)				
	Chloroform	Carbon Tetrachloride	1,2-Dichloroethane	1,4-Dichlorobenzene
RSL	0.11	0.41	0.94	0.22
7/20/12	0.19	0.45	*	*
10/24/12	0.31	0.45	0.26	0.29

C3				
Analyte (Results in µg/m³)				
	Chloroform	Carbon Tetrachloride	1,2-Dichloroethane	1,4-Dichlorobenzene
RSL	0.11	0.41	0.94	0.22
7/20/12	0.18	0.54	*	*
10/24/12	0.25	0.54	0.17	0.34

C4				
Analyte (Results in µg/m³)				
	Chloroform	Carbon Tetrachloride	1,2-Dichloroethane	1,4-Dichlorobenzene
RSL	0.11	0.41	0.94	0.22
7/20/12	0.20	0.46	*	*
10/24/12	0.28	0.54	2.1	0.42

Figure 2
Pfizer Quarterly Ambient Air Sampling Results
(Chlorinated Compounds)
American Cyanamid Superfund Site
Bridgewater, New Jersey

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Notes

1. $\mu\text{g}/\text{m}^3$ = micrograms per cubic meter
2. MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.
3. RSLs are the residential values published May 2012 (http://www.epa.gov/reg3hwmd/risk/human/rbconcentration_table/index.htm)
4. * = Result less than reporting limit.

Figure 3
Pfizer Quarterly Ambient Air Sampling Results
(Formaldehyde and Acetaldehyde)
American Cyanamid Superfund Site
Bridgewater, New Jersey

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Summary of Ambient Air Monitoring Results, 1st Quarter 2013 Sampling Event, American Cyanamid Superfund Site, Bridgewater, New Jersey

PREPARED FOR: Pfizer Inc., on behalf of Wyeth Holdings Corporation
PREPARED BY: CH2M HILL
DATE: February 26, 2013

Introduction

This technical memorandum presents the results for the ambient air monitoring program for the American Cyanamid Superfund Site (Site) property perimeter and Impoundments 1 and 2 located in Bridgewater Township, New Jersey (Site). The results presented here were from the third ambient air sampling event (1st Quarter 2013), performed on January 8-9, 2013. The results from the first and second sampling events, performed July 19-20, 2012 (3rd Quarter) and October 24-25 (4th Quarter), 2012 respectively, are reported in separate technical memoranda. The overall objective of this program is to develop a baseline set of ambient air monitoring data prior to remedy implementation. Air sampling was conducted using the methods described in the *Ambient Air Monitoring Quality Assurance Project Plan* (May 2012).

Summary of Analytical Results

The analytical results are presented in the following tables:

- Volatile organic compounds (VOCs) analyzed using EPA Method TO-15 are presented in Table 1.
- Aldehydes analyzed using EPA Method TO-11A and polycyclic aromatic hydrocarbons (PAHs) analyzed using EPA Method TO-13A are presented in Table 2.
- Reduced sulfur compounds analyzed using ASTM Method 5504-08 are presented in Table 3.
- Particulate matter finer than 10 um in diameter (PM10) analyzed using gravimetric methods are presented in Table 4.

VOCs. Benzene, carbon tetrachloride and chloroform were detected at concentrations above their respective U.S. Environmental Protection Agency (USEPA) Regional Screening Levels (RSLs) in air in at least one sample. The benzene results at each sampling location are shown in Figure 1. The carbon tetrachloride and chloroform results are shown in Figure 2. Additional samples were collected around location C4 as a result of the elevated benzene detected during the October 2012 sampling as seen in Figure 3. Additional VOC samples were collected approximately 50 feet to the north, east, west, and south of location C4. The sample for E1 was lost as a result of a faulty SUMMA canister. The air was also screened using a photoionization detector (PID) at locations N1 through N9, W2 through W4, and locations E2 through E5. The PID screening did not detect VOCs above background concentrations.

PAHs. PAHs were not detected in any samples.

Aldehydes. Formaldehyde and acetaldehyde were detected at concentrations above the RSLs in three samples collected near Impoundments 1 and 2. These results are shown in Figure 4.

Particulate Matter. Particulate matter was not detected near the impoundments at a detection limit of <0.02 mg/m³.

Analytes not detected. Hydrogen sulfide was detected in a single sample near the impoundment at a concentration of 23 ug/m³.

Discussion

The analytical results from the January 2013 sampling event were also compared with background levels typically found in urban air and the upwind perimeter samples considered to be local background ambient air concentrations during this particular event. Urban air toxics monitoring is performed in four urban locations in New Jersey under the U.S. Environmental Protection Agency's (EPA) Urban Air Toxics Monitoring Program (UMATP). The most recently available UMATP monitoring data (EPA, 2011, presenting data from 2008 and 2009) were used for this comparison. The New Jersey monitoring sites are located in Camden, Chester, Elizabeth and New Brunswick. Analytical results from the July 2012 sampling event were compared with the reported daily average; the daily average of a particular pollutant is the average concentration of all measured detections from sampling events performed by EPA in a year. The results from this comparison are shown in Table 5, and are discussed below in further detail:

- Concentrations of formaldehyde and acetaldehyde detected during the 1st Quarter 2013 sampling event were higher than daily average urban background concentrations at two locations close to the impoundments (locations C1 and C2). Concentrations of these two aldehydes are indistinguishable from background at a third location (location C3).
- Concentrations of benzene at perimeter sampling locations were similar to or slightly higher than the daily urban background concentrations. All benzene concentrations detected during the 1st Quarter of 2013 were significantly lower than the maximum urban background concentration for benzene (34.1 ug/m³) reported in the USEPA Urban Air Toxics Monitoring Program (UATMP). The most recently available UMATP monitoring data (USEPA, 2011, presenting data from 2008 and 2009) were used for this comparison. The New Jersey monitoring sites are located in Camden, Chester, Elizabeth and New Brunswick. Benzene concentrations around the impoundments are slightly higher than background concentrations. Benzene concentrations in samples W1, N1, and S1 were similar to concentrations detected at the other impoundment sampling locations. The highest benzene concentration during the January 2013 event was detected at Location N1 (4.3 ug/m³).
- Chloroform and carbon tetrachloride concentrations are indistinguishable from the daily average urban background concentrations.
- Hydrogen sulfide was detected in a single sample above screening levels.

Based on this evaluation, the concentrations of volatile compounds detected at the perimeter of the facility during the 1st Quarter of 2013 are not distinguishable from concentrations normally present in ambient air in urban areas. Concentrations of selected VOCs and aldehydes around the impoundments, particularly at Stations C2 and C3 were higher than the daily urban background levels, but were lower than maximum background levels.

References

U.S. Environmental Protection Agency. 2011. *2008-2009 National Monitoring Programs (UATMP, NATTS and CSATAM), Volume I*. Office of Air Quality Planning and Standards. EPA-454/R-11-013a. December.

Tables

DRAFT - Table 1

Volatile Organic Compounds (VOCs) Analyzed Using EPA Method TO-15

January 2013 Ambient Air Monitoring Event

Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgewater, New Jersey

CAS#	Parameter	Sample Location Field Sample ID Sample Date Sample Type Units	PZAA-P1			PZAA-P2			PZAA-P3			PZAA-P4			PZAA-P5			PZAA-P6			PZAA-P7			PZAA-P8			PZAA-C1			PZAA-C2					
			PZAA-P1-010913			PZAA-P2-010913			PZAA-P3-010913			PZAA-P4-010913			PZAA-P5-010913			PZAA-P6-010913			PZAA-P7-010913			PZAA-P8-010913			PZAA-C1-010913			PZAA-C2-010913					
			1/9/2013			1/9/2013			1/9/2013			1/9/2013			1/9/2013			1/9/2013			1/9/2013			1/9/2013			1/9/2013			1/9/2013					
			Regular			Regular			Regular			Regular			Regular			Regular			Regular			Regular			Regular			Regular					
µg/m³			µg/m³			µg/m³			µg/m³			µg/m³			µg/m³			µg/m³			µg/m³			µg/m³			µg/m³			µg/m³					
Regional Screening Level µg/m³			Result			MRL			Result			MRL			Result			MRL			Result			MRL			Result			MRL					
115-07-1	Propene	3,100	2.1	0.74	=	1.6	0.73	=	1.6	0.73	=	1.6	0.67	=	1.4	0.69	=	1.8	0.69	=	1.5	0.66	=	1.5	0.8	=	1.5	0.7	=	3.6	0.72	=	1.5	0.67	
75-71-8	Dichlorodifluoromethane (CFC 12)	100	2.2	0.74	=	2.1	0.73	=	2.1	0.73	=	2.2	0.67	=	2.2	0.69	=	2.1	0.69	=	2.1	0.66	=	2.2	0.8	=	2.2	0.72	=	2.1	0.67				
74-87-3	Chloromethane	94	0.61	0.3	=	0.53	0.29	=	0.56	0.29	=	0.57	0.27	=	0.55	0.28	=	0.57	0.27	=	0.52	0.26	=	0.55	0.32	=	0.57	0.28	=	0.58	0.29	=	0.56	0.27	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	-	ND	0.74	U	ND	0.73	U	ND	0.73	U	ND	0.67	U	ND	0.69	U	ND	0.66	U	ND	0.8	U	ND	0.7	U	ND	0.72	U	ND	0.67				
75-01-4	Vinyl Chloride	0.16	ND	0.15	U	ND	0.15	U	ND	0.15	U	ND	0.13	U	ND	0.14	U	ND	0.14	U	ND	0.13	U	ND	0.16	U	ND	0.14	U	ND	0.14	U	ND	0.13	
106-99-0	1,3-Butadiene	0.081	ND	0.3	U	ND	0.29	U	ND	0.29	U	ND	0.27	U	ND	0.28	U	ND	0.27	U	ND	0.26	U	ND	0.32	U	ND	0.28	U	ND	0.29	U	ND	0.27	
74-83-9	Bromomethane	5.2	ND	0.15	U	ND	0.15	U	ND	0.15	U	ND	0.13	U	ND	0.14	U	ND	0.14	U	ND	0.13	U	ND	0.16	U	ND	0.14	U	ND	0.13				
75-00-3	Chloroethane	10,000	ND	0.15	U	ND	0.15	U	ND	0.15	U	ND	0.13	U	ND	0.14	U	ND	0.14	U	ND	0.13	U	ND	0.16	U	ND	0.14	U	ND	0.13				
64-17-5	Ethanol	-	10	7.4	=	7.3	7.3	=	ND	7.3	U	9.5	6.7	=	ND	6.9	U	10	6.9	=	7.1	6.6	=	ND	8	U	7.4	7	=	ND	7.2	U	ND	6.7	
75-05-8	Acetonitrile	63	ND	0.74	U	ND	0.73	U	ND	0.73	U	ND	0.67	U	ND	0.69	U	ND	0.69	U	ND	0.66	U	ND	0.8	U	ND	0.7	U	ND	0.72	U	ND	0.67	
107-02-8	Acrolein	0.021	ND	3	U	ND	2.9	U	ND	2.9	U	ND	2.7	U	ND	2.8	U	ND	2.7	U	ND	2.6	U	ND	3.2	U	ND	2.8	U	ND	2.9	U	ND	2.7	
67-64-1	Acetone	32,000	16	7.4	=	13	7.3	=	9.3	7.3	=	7.3	6.7	=	8.1	6.9	=	7	6.9	=	7.8	6.6	=	ND	8	U	8.3	7	=	10	7.2	=	7.5	6.7	
75-69-4	Trichlorofluoromethane	730	1.4	0.15	=	2.4	0.15	=	2.1	0.15	=	1.5	0.13	=	1.4	0.14	=	1.3	0.14	=	1.3	0.13	=	2.1	0.16	=	1.6	0.14	=	1.6	0.14	=	1.5	0.13	
67-63-0	2-Propanol (Isopropyl Alcohol)	7,300	ND	7.4	U	ND	7.3	U	ND	7.3	U	ND	6.7	U	ND	6.9	U	ND	6.9	U	ND	6.6	U	ND	8	U	ND	7	U	ND	11	7.2	=	ND	6.7
107-13-1	Acrylonitrile	0.036	ND	0.74	U	ND	0.73	U	ND	0.73	U	ND	0.67	U	ND	0.69	U	ND	0.69	U	ND	0.66	U	ND	0.8	U	ND	0.7	U	ND	0.72	U	ND	0.67	
75-35-4	1,1-Dichloroethene	210	ND	0.15	U	ND	0.15	U	ND	0.15	U	ND	0.13	U	ND	0.14	U	ND	0.13	U	ND	0.16	U	ND	0.14	U	ND	0.14	U	ND	0.13				
75-09-2	Methylene Chloride	96	0.97	0.74	=	0.89	0.73	=	0.89	0.73	=	0.82	0.67	=	0.83	0.69	=	0.78	0.69	=	0.82	0.66	=	1.2	0.8	=	0.81	0.7	=	0.86	0.72				

DRAFT - Table 1
 Volatile Organic Compounds (VOCs) Analyzed Using EPA Method TO-15
 January 2013 Ambient Air Monitoring Event
 Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgewater, New Jersey

CAS#	Parameter	Regional Screening Level µg/m³	Sample Location			PZAA-P1			PZAA-P2			PZAA-P3			PZAA-P4			PZAA-P5			PZAA-P6			PZAA-P7			PZAA-P8			PZAA-C1			PZAA-C2			PZAA-C3		
			Field Sample ID			PZAA-P1-010913	PZAA-P2-010913	PZAA-P3-010913	PZAA-P4-010913	PZAA-P5-010913	PZAA-P6-010913	PZAA-P7-010913	PZAA-P8-010913	PZAA-C1-010913	PZAA-C2-010913	PZAA-C3-0105																						
			Sample Date			1/9/2013	1/9/2013	1/9/2013	1/9/2013	1/9/2013	1/9/2013	1/9/2013	1/9/2013	1/9/2013	1/9/2013																							
			Sample Type Units			Regular	Regular	Regular	Regular	Regular	Regular	Regular	Regular	Regular	Regular	Regular	Regular	Regular	Regular	Regular	Regular																	
			µg/m³	µg/m³	µg/m³	µg/m³	µg/m³	µg/m³	µg/m³	µg/m³	µg/m³	µg/m³	µg/m³	µg/m³	µg/m³	µg/m³	µg/m³	µg/m³	µg/m³	µg/m³	µg/m³	µg/m³	µg/m³	µg/m³	µg/m³	µg/m³	µg/m³	µg/m³	µg/m³	µg/m³								
			Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual	Result	MRL							
111-65-9	n-Octane	–	ND	0.74	U	ND	0.73	U	ND	0.73	U	ND	0.67	U	ND	0.69	U	ND	0.69	U	ND	0.66	U	ND	0.8	U	ND	0.7	U	ND	0.72	U	ND	0.67				
127-18-4	Tetrachloroethene	9.4	0.2	0.15	=	0.21	0.15	=	0.21	0.15	=	0.2	0.13	=	0.18	0.14	=	0.17	0.14	=	0.2	0.13	=	0.19	0.16	=	0.18	0.14	=	0.37	0.14	=	0.18	0.13				
108-90-7	Chlorobenzene	52	ND	0.15	U	0.37	0.15	=	1.6	0.15	=	0.29	0.13	=	0.39	0.14	=	ND	0.14	U	0.27	0.13	=	ND	0.16	U	0.43	0.14	=	0.32	0.14	=	0.43	0.13				
100-41-4	Ethylbenzene	0.97	ND	0.74	U	ND	0.73	U	ND	0.73	U	ND	0.67	U	ND	0.69	U	ND	0.69	U	ND	0.66	U	ND	0.8	U	ND	0.7	U	ND	0.72	U	ND	0.67				
179601-23-1	m,p-Xylenes	100	1.4	0.74	=	1.5	0.73	=	1.4	0.73	=	1.3	0.67	=	1.3	0.69	=	1.2	0.69	=	1.1	0.66	=	1.2	0.8	=	1.3	0.7	=	1.4	0.72	=	1.2	0.67				
75-25-2	Bromoform	2.2	ND	0.74	U	ND	0.73	U	ND	0.73	U	ND	0.67	U	ND	0.69	U	ND	0.69	U	ND	0.66	U	ND	0.8	U	ND	0.7	U	ND	0.72	U	ND	0.67				
100-42-5	Styrene	1,000	ND	0.74	U	ND	0.73	U	ND	0.73	U	ND	0.67	U	ND	0.69	U	ND	0.69	U	ND	0.66	U	ND	0.8	U	ND	0.7	U	ND	0.72	U	ND	0.67				
95-47-6	o-Xylene	100	ND	0.74	U	ND	0.73	U	ND	0.73	U	ND	0.67	U	ND	0.69	U	ND	0.69	U	ND	0.66	U	ND	0.8	U	ND	0.7	U	ND	0.72	U	ND	0.67				
111-84-2	n-Nonane	210	ND	0.74	U	ND	0.73	U	ND	0.73	U	ND	0.67	U	ND	0.69	U	ND	0.69	U	ND	0.66	U	ND	0.8	U	ND	0.7	U	ND	0.72	U	ND	0.67				
79-34-5	1,1,2,2-Tetrachloroethane	0.042	ND	0.15	U	ND	0.15	U	ND	0.15	U	ND	0.13	U	ND	0.14	U	ND	0.14	U	ND	0.13	U	ND	0.16	U	ND	0.14	U	ND	0.14	U	ND	0.13				
98-82-8	Cumene	420	ND	0.74	U	ND	0.73	U	ND	0.73	U	ND	0.67	U	ND	0.69	U	ND	0.69	U	ND	0.66	U	ND	0.8	U	ND	0.7	U	ND	0.72	U	ND	0.67				
80-56-8	alpha-Pinene	–	1.5	0.74	=	2.4	0.73	=	2	0.73	=	1.6	0.67	=	1.5	0.69	=	1.6	0.69	=	2.5	0.66	=	2	0.8	=	1.9	0.7	=	1.8	0.72	=	1.7	0.67				
103-65-1	n-Propylbenzene	1,000	ND	0.74	U	ND	0.73	U	ND	0.73	U	ND	0.67	U	ND	0.69	U	ND	0.69	U	ND	0.66	U	ND	0.8	U	ND	0.7	U	ND	0.72	U	ND	0.67				
622-96-8	4-Ethyltoluene	–	ND	0.74	U	ND	0.73	U	ND	0.73	U	ND	0.67	U	ND	0.69	U	ND	0.69	U	ND	0.66	U	ND	0.8	U	ND	0.7	U	ND	0.72	U	ND	0.67				
108-67-8	1,3,5-Trimethylbenzene	–	ND	0.74	U	ND	0.73	U	ND	0.73	U	ND	0.67	U	ND	0.69	U	ND	0.69	U	ND	0.66	U	ND	0.8	U	ND	0.7	U	ND	0.72	U	ND	0.67				
95-63-6	1,2,4-Trimethylbenzene	7.3	ND	0.74	U	ND	0.73	U	ND	0.73	U	ND	0.67	U	ND	0.69	U	ND	0.69	U	ND	0.66	U	ND	0.8	U	ND	0.7	U	ND	0.72	U	ND	0.67				
100-44-7	Benzyl Chloride	0.05	ND	0.74	U	ND	0.73	U	ND	0.73	U	ND	0.67	U	ND	0.69	U	ND	0.69	U	ND	0.66	U	ND	0.8	U	ND	0.7	U	ND	0.72	U	ND	0.67				
541-73-1	1,3-Dichlorobenzene	–	ND	0.15	U	ND	0.15	U	ND	0.15	U	ND	0.13	U	ND	0.14	U	ND	0.14	U	ND	0.13	U	ND	0.16	U	ND	0.14	U	ND	0.14	U	ND	0.13				
106-46-7	1,4-Dichlorobenzene	0.22	ND	0.15	U	ND	0.15	U	ND	0.15	U	ND	0.13	U	ND	0.14	U	ND	0.14	U	ND	0.13	U	ND	0.16	U	ND	0.14	U	ND	0.14	U	ND	0.13				
95-50-1	1,2-Dichlorobenzene	210	ND	0.15	U	ND	0.15	U	0.22	0.15	=																											

DRAFT - Table 1

Volatile Organic Compounds (VOCs) Analyzed Using EPA Method TO-15
 January 2013 Ambient Air Monitoring Event
 Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgewater, NJ

CAS#	Parameter	Sample Location Field Sample ID Sample Date Sample Type Units	PZAA-C3			PZAA-C4			PZAA-W1			PZAA-N1			PZAA-S1			
			PZAA-C3-010913-D		PZAA-C4-010913	PZAA-W1-010913		PZAA-N1-010913	PZAA-S1-010913									
			1/9/2013	1/9/2013	1/9/2013	1/9/2013	1/9/2013	1/9/2013	1/9/2013	1/9/2013	1/9/2013	1/9/2013	1/9/2013	1/9/2013	1/9/2013	1/9/2013		
			Duplicate	Duplicate	Regular	Regular	Regular	Regular	Regular	Regular	Regular	Regular	Regular	Regular	Regular	Regular	Regular	
			µg/m³	µg/m³	µg/m³	µg/m³	µg/m³	µg/m³	µg/m³	µg/m³	µg/m³	µg/m³	µg/m³	µg/m³	µg/m³	µg/m³	µg/m³	
Regional Screening Level µg/m³																		
CAS#	Parameter	Qual	Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual	
115-07-1	Propene		3,100			=	1.5	0.71	=	1.4	0.75	=	1.2	0.71	=	1.2	0.67	=
75-71-8	Dichlorodifluoromethane (CFC 12)		100			=	2.1	0.71	=	2.1	0.75	=	2.1	0.71	=	2.1	0.67	=
74-87-3	Chloromethane		94			=	0.58	0.28	=	0.54	0.3	=	0.57	0.28	=	0.54	0.28	=
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)		-			U	ND	0.71	U	ND	0.75	U	ND	0.71	U	ND	0.7	U
75-01-4	Vinyl Chloride		0.16			U	ND	0.14	U	ND	0.15	U	ND	0.14	U	ND	0.14	U
106-99-0	1,3-Butadiene		0.081			U	ND	0.28	U	ND	0.3	U	ND	0.28	U	ND	0.28	U
74-83-9	Bromomethane		5.2			U	ND	0.14	U	ND	0.15	U	ND	0.14	U	ND	0.14	U
75-00-3	Chloroethane		10,000			U	ND	0.14	U	ND	0.15	U	ND	0.14	U	ND	0.14	U
64-17-5	Ethanol		-			U	ND	7.1	U	9.6	7.5	=	7.2	7.1	=	ND	7	U
75-05-8	Acetonitrile		63			U	ND	0.71	U	ND	0.75	U	ND	0.71	U	ND	0.7	U
107-02-8	Acrolein		0.021			U	ND	2.8	U	ND	3	U	ND	2.8	U	ND	2.8	U
67-64-1	Acetone		32,000			=	7.5	7.1	=	12	7.5	=	8.4	7.1	=	7.4	7	=
75-69-4	Trichlorofluoromethane		730			=	1.6	0.14	=	1.5	0.15	=	1.5	0.14	=	1.3	0.14	=
67-63-0	2-Propanol (Isopropyl Alcohol)		7,300			U	ND	7.1	U	ND	7.5	U	ND	7.1	U	ND	7	U
107-13-1	Acrylonitrile		0.036			U	ND	0.71	U	ND	0.75	U	ND	0.71	U	ND	0.7	U
75-35-4	1,1-Dichloroethene		210			U	ND	0.14	U	ND	0.15	U	ND	0.14	U	ND	0.14	U
75-09-2	Methylene Chloride		96			=	0.83	0.71	=	0.83	0.75	=	0.81	0.71	=	ND	0.7	U
107-05-1	3-Chloro-1-propene (Allyl Chloride)		0.41			U	ND	0.14	U	ND	0.15	U	ND	0.14	U	ND	0.14	U
76-13-1	Trichlorotrifluoroethane		31,000			=	0.53	0.14	=	0.53	0.15	=	0.53	0.14	=	0.52	0.14	=
75-15-0	Carbon Disulfide		730			U	ND	7.1	U	ND	7.5	U	ND	7.1	U	ND	7	U
156-60-5	trans-1,2-Dichloroethene		63			U	ND	0.14	U	ND	0.15	U	ND	0.14	U	ND	0.14	U
75-34-3	1,1-Dichloroethane		1.5			U	ND	0.14	U	ND	0.15	U	ND	0.14	U	ND	0.14	U
1634-04-4	Methyl tert-Butyl Ether		9.4			U	ND	0.14	U	ND	0.15	U	ND	0.14	U	ND	0.14	U
108-05-4	Vinyl Acetate		210			U	ND	7.1	U	ND	7.5	U	ND	7.1	U	ND	7	U
78-93-3	2-Butanone (MEK)		5,200			U	ND	7.1	U	ND	7.5	U	ND	7.1	U	ND	7	U
156-59-2	cis-1,2-Dichloroethene		-			U	ND	0.14	U	ND	0.15	U	ND	0.14	U	ND	0.14	U
141-78-6	Ethyl Acetate		-			U	ND	1.4	U	ND	1.5	U	ND	1.4	U	ND	1.4	U
110-54-3	n-Hexane		730			=	0.96	0.71	=	0.96	0.75	=	0.99	0.71	=	0.89	0.7	=
67-66-3	Chloroform		0.11			=	0.18	0.14	=	0.19	0.15	=	0.2	0.14	=	0.21	0.14	=
109-99-9	Tetrahydrofuran (THF)		-			U	ND	0.71	U	ND	0.75	U	ND	0.71	U	ND	0.7	U
107-06-2	1,2-Dichloroethane		0.094			U	ND	0.14	U	ND	0.15	U	ND	0.14	U	ND	0.14	U
71-55-6	1,1,1-Trichloroethane		5,200			U	ND	0.14	U	ND	0.15	U	ND	0.14	U	ND	0.14	U
71-43-2	Benzene		0.31			=	3.4	0.14	=	3.3	0.15	=	2.9	0.14	=	4.3	0.14	=
56-23-5	Carbon Tetrachloride		0.41			=	0.49	0.14	=	0.41	0.15	=	0.45	0.14	=	0.46	0.14	=
110-82-7	Cyclohexane		6,300			U	ND	1.4	U	ND	1.5	U	ND	1.4	U	ND	1.4	U
78-87-5	1,2-Dichloropropane		0.24			U	ND	0.14	U	ND	0.15	U	ND	0.14	U	ND	0.14	U
75-27-4	Bromodichloromethane		0.066			U	ND	0.14	U	ND	0.15	U	ND	0.14	U	ND	0.14	U
79-01-6	Trichloroethene		0.43			U	ND	0.14	U	ND	0.15	U	ND	0.14	U	ND	0.14	U
123-91-1	1,4-Dioxane		0.32			U	ND	0.71	U	ND	0.75	U	ND	0.71	U	ND	0.7	U
80-62-6	Methyl Methacrylate		730			U	ND	1.4	U	ND	1.5	U	ND	1.4	U	ND	1.4	U
142-82-5	n-Heptane		-			U	ND	0.71	U	ND	0.75	U	ND	0.71	U	ND	0.7	U
10061-01-5	cis-1,3-Dichloropropene		0.61			U	ND	0.71	U	ND	0.75	U	ND	0.71	U	ND	0.7	U
108-10-1	4																	

DRAFT - Table 1
 Volatile Organic Compounds (VOCs) Analyzed Using EPA Method TO-15
 January 2013 Ambient Air Monitoring Event
 Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgewater, NJ

CAS#	Parameter	Sample Location		PZAA-C3			PZAA-C4			PZAA-W1			PZAA-N1			PZAA-S1			
		Field Sample ID	PZAA-C3-010913-D	PZAA-C4-010913			PZAA-W1-010913			PZAA-N1-010913			PZAA-S1-010913						
		Sample Date	1/9/2013	1/9/2013			1/9/2013			1/9/2013			1/9/2013						
		Sample Type	Duplicate			Regular			Regular			Regular			Regular				
		Units	µg/m³			µg/m³			µg/m³			µg/m³			µg/m³				
Regional Screening Level µg/m³				Qual	Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual
111-65-9	n-Octane	-		U	ND	0.71	U	ND	0.75	U	ND	0.71	U	ND	0.7	U	ND	0.67	U
127-18-4	Tetrachloroethene	9.4		=	0.19	0.14	=	0.2	0.15	=	0.18	0.14	=	0.17	0.14	=	0.18	0.13	=
108-90-7	Chlorobenzene	52		=	0.4	0.14	=	0.31	0.15	=	0.5	0.14	=	0.38	0.14	=	0.58	0.13	=
100-41-4	Ethylbenzene	0.97		U	ND	0.71	U	ND	0.75	U	ND	0.71	U	ND	0.7	U	ND	0.67	U
179601-23-1	m,p-Xylenes	100		=	1.2	0.71	=	1.3	0.75	=	1.3	0.71	=	1.1	0.7	=	1.2	0.67	=
75-25-2	Bromoform	2.2		U	ND	0.71	U	ND	0.75	U	ND	0.71	U	ND	0.7	U	ND	0.67	U
100-42-5	Styrene	1,000		U	ND	0.71	U	ND	0.75	U	ND	0.71	U	ND	0.7	U	ND	0.67	U
95-47-6	o-Xylene	100		U	ND	0.71	U	ND	0.75	U	ND	0.71	U	ND	0.7	U	ND	0.67	U
111-84-2	n-Nonane	210		U	ND	0.71	U	ND	0.75	U	ND	0.71	U	ND	0.7	U	ND	0.67	U
79-34-5	1,1,2,2-Tetrachloroethane	0.042		U	ND	0.14	U	ND	0.15	U	ND	0.14	U	ND	0.14	U	ND	0.13	U
98-82-8	Cumene	420		U	ND	0.71	U	ND	0.75	U	ND	0.71	U	ND	0.7	U	ND	0.67	U
80-56-8	alpha-Pinene	-		=	1.8	0.71	=	1.7	0.75	=	1.7	0.71	=	1.4	0.7	=	1.8	0.67	=
103-65-1	n-Propylbenzene	1,000		U	ND	0.71	U	ND	0.75	U	ND	0.71	U	ND	0.7	U	ND	0.67	U
622-96-8	4-Ethyltoluene	-		U	ND	0.71	U	ND	0.75	U	ND	0.71	U	ND	0.7	U	ND	0.67	U
108-67-8	1,3,5-Trimethylbenzene	-		U	ND	0.71	U	ND	0.75	U	ND	0.71	U	ND	0.7	U	ND	0.67	U
95-63-6	1,2,4-Trimethylbenzene	7.3		U	ND	0.71	U	ND	0.75	U	ND	0.71	U	ND	0.7	U	ND	0.67	U
100-44-7	Benzyl Chloride	0.05		U	ND	0.71	U	ND	0.75	U	ND	0.71	U	ND	0.7	U	ND	0.67	U
541-73-1	1,3-Dichlorobenzene	-		U	ND	0.14	U	ND	0.15	U	ND	0.14	U	ND	0.14	U	ND	0.13	U
106-46-7	1,4-Dichlorobenzene	0.22		U	ND	0.14	U	ND	0.15	U	ND	0.14	U	ND	0.14	U	ND	0.13	U
95-50-1	1,2-Dichlorobenzene	210		U	ND	0.14	U	ND	0.15	U	ND	0.14	U	ND	0.14	U	ND	0.13	U
5989-27-5	d-Limonene	-		U	ND	0.71	U	ND	0.75	U	ND	0.71	U	ND	0.7	U	ND	0.67	U
96-12-8	1,2-Dibromo-3-chloropropane	0.00016		U	ND	0.71	U	ND	0.75	U	ND	0.71	U	ND	0.7	U	ND	0.67	U
120-82-1	1,2,4-Trichlorobenzene	2.1		U	ND	0.71	U	ND	0.75	U	ND	0.71	U	ND	0.7	U	ND	0.67	U
91-20-3	Naphthalene	0.072		U	ND	0.71	U	ND	0.75	U	ND	0.71	U	ND	0.7	U	ND	0.67	U
87-68-3	Hexachlorobutadiene	0.11		U	ND	0.71	U	ND	0.75	U	ND	0.71	U	ND	0.7	U	ND	0.67	U

Notes:

µg/m³ = micrograms per cubic meter

Qual = Lab Qualifier

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be measured.

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

M1 = Matrix interference due to coelution with a non-target compound; results are not included in the analysis.

- = Regional Screening Level (RSL) does not exist for this parameter.

Bold indicates a detection

Yellow highlight = Exceedance of the RSL

RSLs are the residential values published November 2012,

http://www.epa.gov/reg3hwmd/risk/human/rb-concentration_table/Generic_Tables/p

Green highlight indicates RSL has changed since last update (May 2012).

DRAFT - Table 2

Aldehydes (Analyzed Using EPA Method TO-11A) and Polycyclic Aromatic Hydrocarbons (Analyzed Using EPA Method TO-13A)

January 2013 Ambient Air Monitoring Event

Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgewater, New Jersey

CAS#	Parameter	Regional Screening Level µg/m³	Sample Location			PZAA-C1			PZAA-C2			PZAA-C3					
			Field Sample ID	PZAA-C1-010913		PZAA-C2-010913		PZAA-C3-010913									
				Sample Date		1/9/2013		1/9/2013		1/9/2013							
						Sample Type		Regular		Regular		Regular					
								µg/m³		µg/m³		µg/m³					
			Units	Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Result	MRL	Qual			
50-00-0	FORMALDEHYDE	0.19		13	0.14	=	7.4	0.14	=	3	0.069		=				
75-07-0	ACETALDEHYDE	1.1		6.9	0.14	=	6.4	0.14	=	1.9	0.069		=				
123-38-6	n-PROPANOL	8.3		0.14	0.14	U	0.14	0.14	U	0.069	0.069		U				
4170-30-3	CROTONALDEHYDE	-		0.14	0.14	U	0.14	0.14	U	0.069	0.069		U				
123-72-8	Butyraldehyde	-		0.14	0.14	U	0.14	0.14	U	0.069	0.069		U				
100-52-7	BENZALDEHYDE	-		0.14	0.14	U	0.14	0.14	U	0.069	0.069		U				
590-86-3	3-Methylbutyraldehyde	-		0.14	0.14	U	0.14	0.14	U	0.069	0.069		U				
110-62-3	Valeraldehyde	-		0.14	0.14	U	0.14	0.14	U	0.069	0.069		U				
529-20-4	2-Methylbenzaldehyde	-		0.14	0.14	U	0.14	0.14	U	0.069	0.069		U				
NA	3-Methylbenzaldehyde + 4-Methylbenzaldehyde	-		0.28	0.28	U	0.28	0.28	U	0.14	0.14		U				
66-25-1	HEXANAL	-		0.14	0.14	U	0.14	0.14	U	0.069	0.069		U				
5779-94-2	2,5-DIMETHYLBENZALDEHYDE	-		0.14	0.14	U	0.14	0.14	U	0.069	0.069		U				
91-20-3	NAPHTHALENE	0.072		0.69	0.69	U	0.69	0.69	U	0.69	0.69		U				
208-96-8	ACENAPHTHYLENE	-		0.069	0.069	UJ	0.069	0.069	UJ	0.069	0.069		UJ				
83-32-9	ACENAPTHENE	-		0.069	0.069	U	0.069	0.069	U	0.069	0.069		U				
86-73-7	FLUORENE	-		0.069	0.069	U	0.069	0.069	U	0.069	0.069		U				
85-01-8	PHENANTHRENE	-		0.069	0.069	U	0.069	0.069	U	0.069	0.069		U				
120-12-7	ANTHRACENE	-		0.069	0.069	U	0.069	0.069	U	0.069	0.069		U				
206-44-0	FLUORANTHENE	-		0.069	0.069	U	0.069	0.069	U	0.069	0.069		U				
129-00-0	PYRENE	-		0.069	0.069	U	0.069	0.069	U	0.069	0.069		U				
56-55-3	BENZO(a)ANTHRACENE	0.0087		0.069	0.069	U	0.069	0.069	U	0.069	0.069		U				
218-01-9	CHRYSENE	0.087		0.069	0.069	U	0.069	0.069	U	0.069	0.069		U				
205-99-2	BENZO(b)FLUORANTHENE	0.0087		0.069	0.069	U	0.069	0.069	U	0.069	0.069		U				
207-08-9	BENZO(k)FLUORANTHENE	0.0087		0.069	0.069	U	0.069	0.069	U	0.069	0.069		U				
50-32-8	BENZO(a)PYRENE	0.00087		0.069	0.069	U	0.069	0.069	U	0.069	0.069		U				
193-39-5	INDENO(1,2,3-c,d)PYRENE	0.0087		0.069	0.069	U	0.069	0.069	U	0.069	0.069		U				
53-70-3	DIBENZ(a,h)ANTHRACENE	0.0008		0.069	0.069	U	0.069	0.069	U	0.069	0.069		U				
191-24-2	BENZO(g,h,i)PERYLENE	-		0.069	0.069	U	0.069	0.069	U	0.069	0.069		U				
81103-79-9	FLUORENE-D10 (%)	-		91	N/A		90	N/A		90	N/A						
1718-52-1	PYRENE-d10 (%)	-		93	N/A		91	N/A		89	N/A						

Notes:

µg/m³ = micrograms per cubic meter

Qual = Lab Qualifier

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

U = Compound was analyzed for, but not detected above the laboratory reporting limit.

BC = Results reported are not blank corrected.

BH = Results indicate breakthrough; back section of tube greater than front section.

BT = Results indicated possible breakthrough; back section > 10% of front section.

M = Matrix interference; results may be biased high.

L = Laboratory control sample recovery outside the specified limits, results may be biased low.

N/A = Not Applicable

NA = Not Analyzed

- = Regional Screening Level (RSL) does not exist for this parameter

Yellow highlight = Exceedance of the RSL

RSLs are the residential values published November 2012,

http://www.epa.gov/reg3hwmd/risk/human/rb-concentration_table/Generic_Tables/pdf/resair_sl_table_run_NOV2012.pdf

DRAFT - Table 3

Reduced Sulfur Compounds Analyzed Using Method ASTM D 5504-08

January 2013 Ambient Air Monitoring Event

Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgewater, New Jersey

Sample Location Field Sample ID Sample Date Sample Type Units	PZAA-C1			PZAA-C1			PZAA-C1					
	PZAA-C1a-010813			PZAA-C1b-010813			PZAA-C1c-010813					
	1/8/2013			1/8/2013			1/8/2013					
	Regular			Regular			Regular					
	$\mu\text{g}/\text{m}^3$			$\mu\text{g}/\text{m}^3$			$\mu\text{g}/\text{m}^3$					
CAS	Parameter	Regional Screening Level $\mu\text{g}/\text{m}^3$		Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual
7783-06-4	HYDROGEN SULFIDE	2.1		23	7	=	7	7	U	7	7	U
463-58-1	Carbonyl Sulfide	-		12	12	U	12	12	U	12	12	U
74-93-1	Methyl Mercaptan	-		9.8	9.8	U	9.8	9.8	U	9.8	9.8	U
75-08-1	Ethyl Mercaptan	-		13	13	U	13	13	U	13	13	U
75-18-3	Dimethyl Sulfide	-		13	13	U	13	13	U	13	13	U
75-15-0	CARBON DISULFIDE	730		7.8	7.8	U	7.8	7.8	U	7.8	7.8	U
75-33-2	Isopropyl Mercaptan	-		16	16	U	16	16	U	16	16	U
75-66-1	tert-Butyl Mercaptan	-		18	18	U	18	18	U	18	18	U
107-03-9	n-Propyl Mercaptan	-		16	16	U	16	16	U	16	16	U
624-89-5	Ethyl Methyl Sulfide	-		16	16	U	16	16	U	16	16	U
110-02-1	Thiophene	-		17	17	U	17	17	U	17	17	U
513-44-0	Isobutyl Mercaptan	-		18	18	U	18	18	U	18	18	U
352-93-2	Diethyl Sulfide	-		18	18	U	18	18	U	18	18	U
109-79-5	n-Butyl Mercaptan	-		18	18	U	18	18	U	18	18	U
624-92-0	METHYL DISULFIDE	-		9.6	9.6	U	9.6	9.6	U	9.6	9.6	U
616-44-4	3-Methylthiophene	-		20	20	U	20	20	U	20	20	U
110-01-0	Tetrahydrothiophene	-		18	18	U	18	18	U	18	18	U
638-02-8	2,5-Dimethylthiophene	-		23	23	U	23	23	U	23	23	U
872-55-9	2-Ethylthiophene	-		23	23	U	23	23	U	23	23	U
110-81-6	Diethyl Disulfide	-		12	12	U	12	12	U	12	12	U

Notes:

 $\mu\text{g}/\text{m}^3$ = micrograms per cubic meter

Qual = Lab Qualifier

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

U = Compound was analyzed for, but not detected above the laboratory reporting limit.

- = Regional Screening Level (RSL) does not exist for this parameter.

Bold indicates a detection

Yellow highlight = Exceedance of the RSL

RSLs are the residential values published November 2012,

http://www.epa.gov/reg3hwmd/risk/human/rb-concentration_table/Generic_Tables/pdf/resair_sl_table_run_NOV2012.pdf

DRAFT - Table 3

Reduced Sulfur Compounds Analyzed Using Method ASTM D 5504-08

January 2013 Ambient Air Monitoring Event

Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgewater, New Jersey

CAS	Parameter	Regional Screening Level $\mu\text{g}/\text{m}^3$	PZAA-C2			PZAA-C2			PZAA-C2		
			PZAA-C2a-010813			PZAA-C2b-010813			PZAA-C2c-010813		
			1/8/2013			1/8/2013			1/8/2013		
			Regular			Regular			Regular		
			$\mu\text{g}/\text{m}^3$			$\mu\text{g}/\text{m}^3$			$\mu\text{g}/\text{m}^3$		
CAS	Parameter	Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual	Result
7783-06-4	HYDROGEN SULFIDE	2.1	7	7	U	7	7	U	7	7	U
463-58-1	Carbonyl Sulfide	—	12	12	U	12	12	U	12	12	U
74-93-1	Methyl Mercaptan	—	9.8	9.8	U	9.8	9.8	U	9.8	9.8	U
75-08-1	Ethyl Mercaptan	—	13	13	U	13	13	U	13	13	U
75-18-3	Dimethyl Sulfide	—	13	13	U	13	13	U	13	13	U
75-15-0	CARBON DISULFIDE	730	7.8	7.8	U	7.8	7.8	U	7.8	7.8	U
75-33-2	Isopropyl Mercaptan	—	16	16	U	16	16	U	16	16	U
75-66-1	tert-Butyl Mercaptan	—	18	18	U	18	18	U	18	18	U
107-03-9	n-Propyl Mercaptan	—	16	16	U	16	16	U	16	16	U
624-89-5	Ethyl Methyl Sulfide	—	16	16	U	16	16	U	16	16	U
110-02-1	Thiophene	—	17	17	U	17	17	U	17	17	U
513-44-0	Isobutyl Mercaptan	—	18	18	U	18	18	U	18	18	U
352-93-2	Diethyl Sulfide	—	18	18	U	18	18	U	18	18	U
109-79-5	n-Butyl Mercaptan	—	18	18	U	18	18	U	18	18	U
624-92-0	METHYL DISULFIDE	—	9.6	9.6	U	9.6	9.6	U	9.6	9.6	U
616-44-4	3-Methylthiophene	—	20	20	U	20	20	U	20	20	U
110-01-0	Tetrahydrothiophene	—	18	18	U	18	18	U	18	18	U
638-02-8	2,5-Dimethylthiophene	—	23	23	U	23	23	U	23	23	U
872-55-9	2-Ethylthiophene	—	23	23	U	23	23	U	23	23	U
110-81-6	Diethyl Disulfide	—	12	12	U	12	12	U	12	12	U

Notes:

 $\mu\text{g}/\text{m}^3$ = micrograms per cubic meter

Qual = Lab Qualifier

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be measured.

U = Compound was analyzed for, but not detected above the laboratory reporting limit.

— = Regional Screening Level (RSL) does not exist for this parameter.

Bold indicates a detection

Yellow highlight = Exceedance of the RSL

RSLs are the residential values published November 2012,

http://www.epa.gov/reg3hwmd/risk/human/rb-concentration_table/Generic_Tables/pdf/res

DRAFT - Table 3

Reduced Sulfur Compounds Analyzed Using Method ASTM D 5504-08

January 2013 Ambient Air Monitoring Event

Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgewater, New Jersey

CAS	Parameter	Regional Screening Level $\mu\text{g}/\text{m}^3$	PZAA-C3			PZAA-C3			PZAA-C3		
			PZAA-C3a-010813			PZAA-C3b-010813			PZAA-C3c-010813		
			1/8/2013			1/8/2013			1/8/2013		
			Regular			Regular			Regular		
			$\mu\text{g}/\text{m}^3$			$\mu\text{g}/\text{m}^3$			$\mu\text{g}/\text{m}^3$		
CAS	Parameter	Regional Screening Level $\mu\text{g}/\text{m}^3$	Result	MRL	Qual	Result	MRL	Qual	Result	MRL	Qual
7783-06-4	HYDROGEN SULFIDE	2.1	7	7	U	7	7	U	7	7	U
463-58-1	Carbonyl Sulfide	-	12	12	U	12	12	U	12	12	U
74-93-1	Methyl Mercaptan	-	9.8	9.8	U	9.8	9.8	U	9.8	9.8	U
75-08-1	Ethyl Mercaptan	-	13	13	U	13	13	U	13	13	U
75-18-3	Dimethyl Sulfide	-	13	13	U	13	13	U	13	13	U
75-15-0	CARBON DISULFIDE	730	7.8	7.8	U	7.8	7.8	U	7.8	7.8	U
75-33-2	Isopropyl Mercaptan	-	16	16	U	16	16	U	16	16	U
75-66-1	tert-Butyl Mercaptan	-	18	18	U	18	18	U	18	18	U
107-03-9	n-Propyl Mercaptan	-	16	16	U	16	16	U	16	16	U
624-89-5	Ethyl Methyl Sulfide	-	16	16	U	16	16	U	16	16	U
110-02-1	Thiophene	-	17	17	U	17	17	U	17	17	U
513-44-0	Isobutyl Mercaptan	-	18	18	U	18	18	U	18	18	U
352-93-2	Diethyl Sulfide	-	18	18	U	18	18	U	18	18	U
109-79-5	n-Butyl Mercaptan	-	18	18	U	18	18	U	18	18	U
624-92-0	METHYL DISULFIDE	-	9.6	9.6	U	9.6	9.6	U	9.6	9.6	U
616-44-4	3-Methylthiophene	-	20	20	U	20	20	U	20	20	U
110-01-0	Tetrahydrothiophene	-	18	18	U	18	18	U	18	18	U
638-02-8	2,5-Dimethylthiophene	-	23	23	U	23	23	U	23	23	U
872-55-9	2-Ethylthiophene	-	23	23	U	23	23	U	23	23	U
110-81-6	Diethyl Disulfide	-	12	12	U	12	12	U	12	12	U

Notes:

 $\mu\text{g}/\text{m}^3$ = micrograms per cubic meter

Qual = Lab Qualifier

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be measured.

U = Compound was analyzed for, but not detected above the laboratory reporting limit.

- = Regional Screening Level (RSL) does not exist for this parameter.

Bold indicates a detection

Yellow highlight = Exceedance of the RSL

RSLs are the residential values published November 2012,

http://www.epa.gov/reg3hwmd/risk/human/rb-concentration_table/Generic_Tables/pdf/res

DRAFT - Table 4

PM 10 Analyzed Using Gravimetric Methods

*January 2013 Ambient Air Monitoring Event**Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgewater, New Jersey*

Sample Location	PZAA-C3		
Sample ID	PZAA-C3-010913		
Sample Date	1/9/2013		
Units	mg/sample	mg/sample	mg/m ³
	Result	MRL	Air Volume
Particulate as PM ₁₀	ND	0.5	<0.020

Notes:

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

mg = milligrams

mg/m³ = milligrams per cubic meter

DRAFT - Table 5

Comparison of Detected Analytes with Urban Background Concentrations

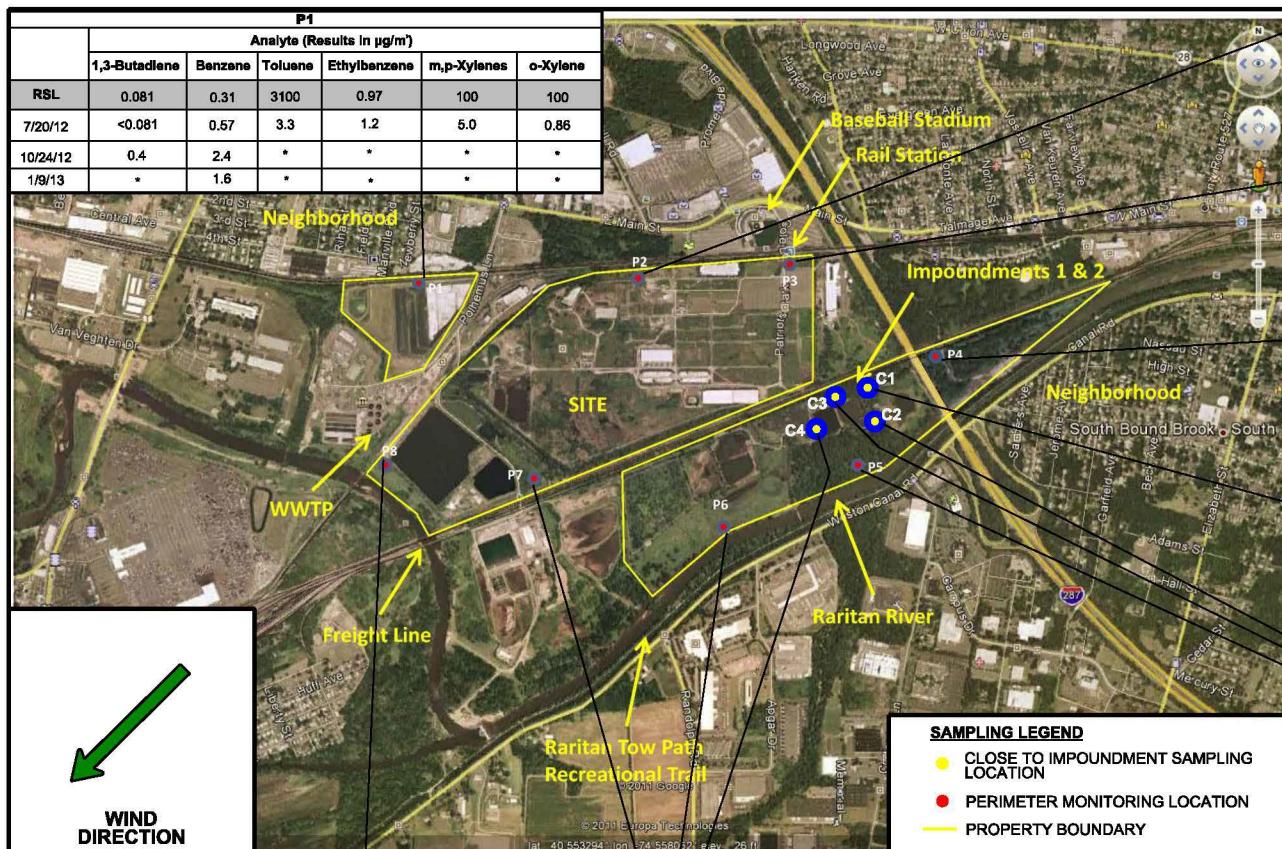
*January 2013 Ambient Air Monitoring Event**Impoundments 1 and 2, American Cyanamid Superfund Site, Bridgewater, New Jersey*

Analyte	Range of Daily Average Urban Background Concentrations (ug/m ³)		Concentration Range Detected at the Bridgewater Site (ug/m ³)
	2008	2009	
Acetaldehyde	1.4 - 2.58	1.34 - 2.47	1.9 - 6.4
Benzene	0.56 - 1.36	0.6 - 1.83	1.3 - 4.3
1,3-Butadiene	0.04 - 0.15	0.03 - 0.16	<0.26 - <0.32
Carbon tetrachloride	0.64 - 0.73	0.67 - 0.72	0.41 - 0.49
Chloroform	0.07 - 0.18	0.11 - 0.17	0.15 - 0.22
Formaldehyde	1.47 - 3.31	2.43 - 3.8	3 - 13
Ethylbenzene	0.47 - 0.88	0.46	<0.66 - <0.8
1,4-Dichlorobenzene	0.11 - 0.19	0.07 - 0.12	<0.13 - <0.16

Notes:

Source for Daily Average Urban Background: Table 19-5, EPA, 2011.

Figures



P8

Analyte (Results in $\mu\text{g}/\text{m}^3$)						
	1,3-Butadiene	Benzene	Toluene	Ethylbenzene	m,p-Xylenes	o-Xylene
RSL	0.081	0.31	3100	0.97	100	100
7/20/12	<0.081	0.69	3.5	1.3	5.0	0.88
10/24/12	0.45	2.5	*	*	*	*
1/9/13	*	1.4	*	*	*	*

P7

Analyte (Results in $\mu\text{g}/\text{m}^3$)						
	1,3-Butadiene	Benzene	Toluene	Ethylbenzene	m,p-Xylenes	o-Xylene
RSL	0.081	0.31	3100	0.97	100	100
7/20/12	<0.081	0.60	2.1	<0.97	1.7	<100
10/24/12	0.45	2.5	*	*	*	*
1/9/13	*	1.4	*	*	*	*

Notes

1. $\mu\text{g}/\text{m}^3$ = micrograms per cubic meter
2. MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.
3. RSLs are the residential values published May 2012 (http://www.epa.gov/reg3hwmd/risk/human/reconcentration_table/index.htm)
4. * = Result less than reporting limit.

P2

Analyte (Results in $\mu\text{g}/\text{m}^3$)						
	1,3-Butadiene	Benzene	Toluene	Ethylbenzene	m,p-Xylenes	o-Xylene
RSL	0.081	0.31	3100	0.97	100	100
7/20/12	<0.081	0.55	3.0	1.1	4.3	0.77
10/24/12	0.61	2.6	*	*	*	*
1/9/13	*	2	*	*	*	*

P3

Analyte (Results in $\mu\text{g}/\text{m}^3$)						
	1,3-Butadiene	Benzene	Toluene	Ethylbenzene	m,p-Xylenes	o-Xylene
RSL	0.081	0.31	3100	0.97	100	100
7/20/12	<0.081	1.0	4.3	1.6	5.7	0.99
10/24/12	0.48	3.5	*	7.5	*	*
1/9/13	*	3.4	*	*	*	*

P4

Analyte (Results in $\mu\text{g}/\text{m}^3$)						
	1,3-Butadiene	Benzene	Toluene	Ethylbenzene	m,p-Xylenes	o-Xylene
RSL	0.081	0.31	3100	0.97	100	100
7/20/12	<0.081	0.84	4.6	0.83	2.2	1.0
10/24/12	0.40	2.1	*	*	*	*
1/9/13	*	3	*	*	*	*

C1

Analyte (Results in $\mu\text{g}/\text{m}^3$)						
	1,3-Butadiene	Benzene	Toluene	Ethylbenzene	m,p-Xylenes	o-Xylene
RSL	0.081	0.31	3100	0.97	100	100
7/20/12	<0.081	0.82	3.9	1.3	4.8	0.90
10/24/12	0.35	1.9	*	*	*	*
1/9/13	*	3.7	*	*	*	*

C2

Analyte (Results in $\mu\text{g}/\text{m}^3$)						
	1,3-Butadiene	Benzene	Toluene	Ethylbenzenes	m,p-Xylenes	o-Xylene
RSL	0.081	0.31	3100	0.97	100	100
7/20/12	<0.081	1.0	3.5	1.1	4.0	<100
10/24/12	0.54	3.2	*	0.98	*	*
1/9/13	*	2.9	*	*	*	*

C3

Analyte (Results in $\mu\text{g}/\text{m}^3$)						
	1,3-Butadiene	Benzene	Toluene	Ethylbenzene	m,p-Xylenes	o-Xylene
RSL	0.081	0.31	3100	0.97	100	100
7/20/12	<0.081	1.3	3.2	0.88	3.1	<100
10/24/12	0.53	7.7	*	.99	*	*
1/9/13	*	3.5	*	*	*	*

P5

Analyte (Results in $\mu\text{g}/\text{m}^3$)						
	1,3-Butadiene	Benzene	Toluene	Ethylbenzene	m,p-Xylenes	o-Xylene
RSL	0.081	0.31	3100	0.97	100	100
7/20/12	0.34	0.90	4.6	0.79	1.9	0.92
10/24/12	0.50	1.6	*	*	*	*
1/9/13	*	2	*	*	*	*

Figure 1
Pfizer Quarterly Ambient Air Sampling Results
(1,3-Butadiene, BTEX)
American Cyanamid Superfund Site
Bridgewater, New Jersey

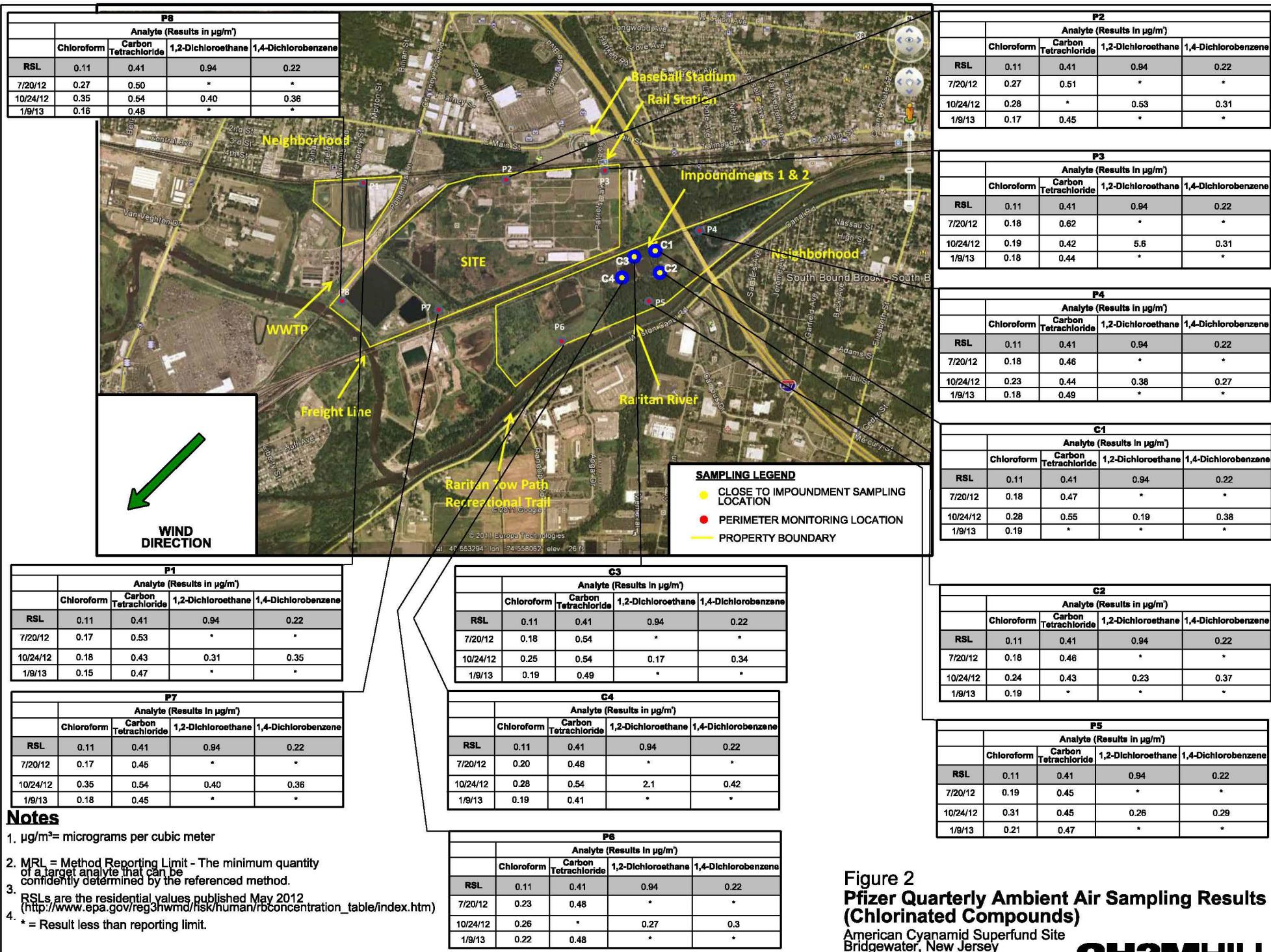


Figure 2
Pfizer Quarterly Ambient Air Sampling Results (Chlorinated Compounds)
American Cyanamid Superfund Site
Bridgewater, New Jersey

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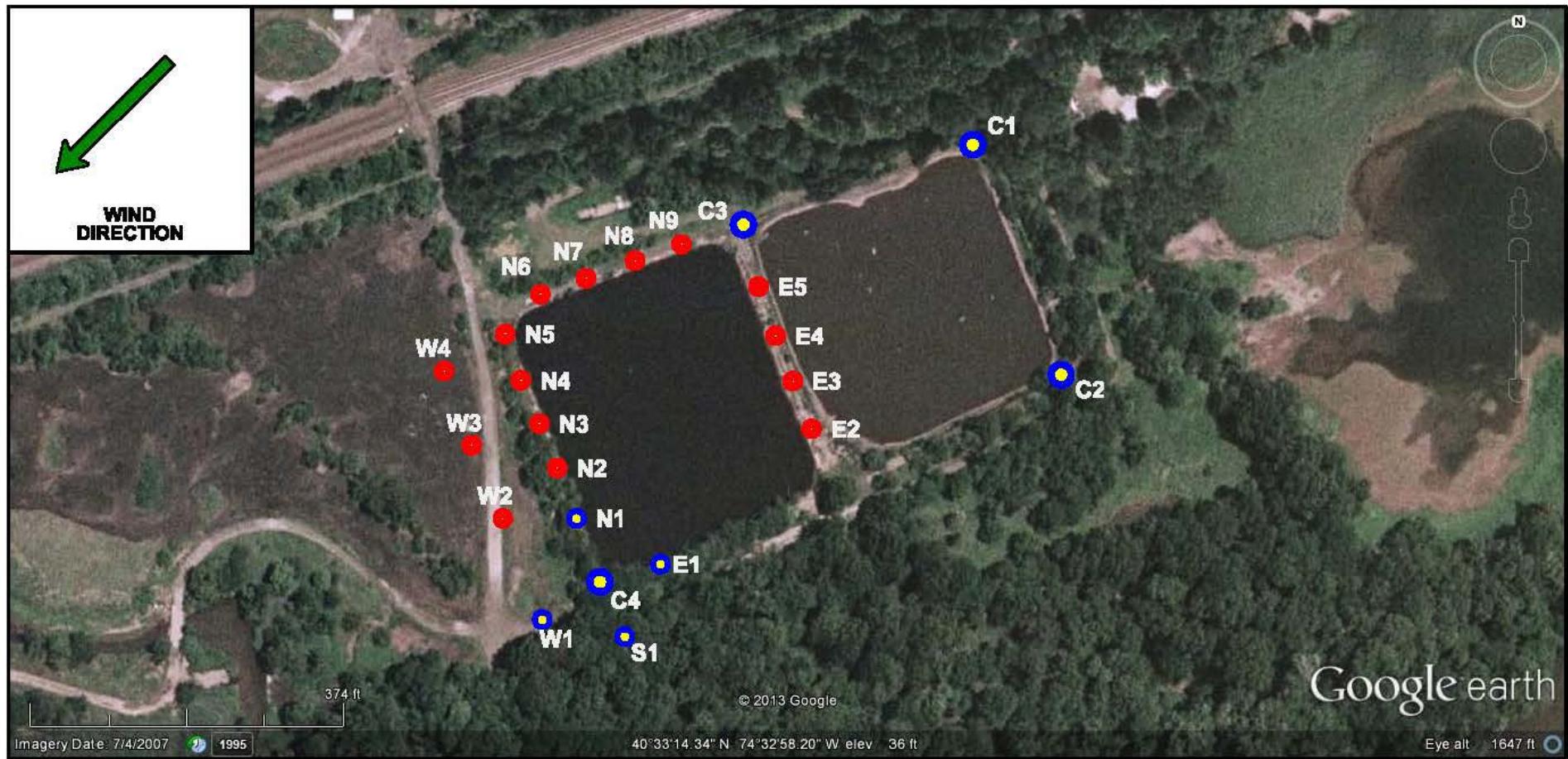
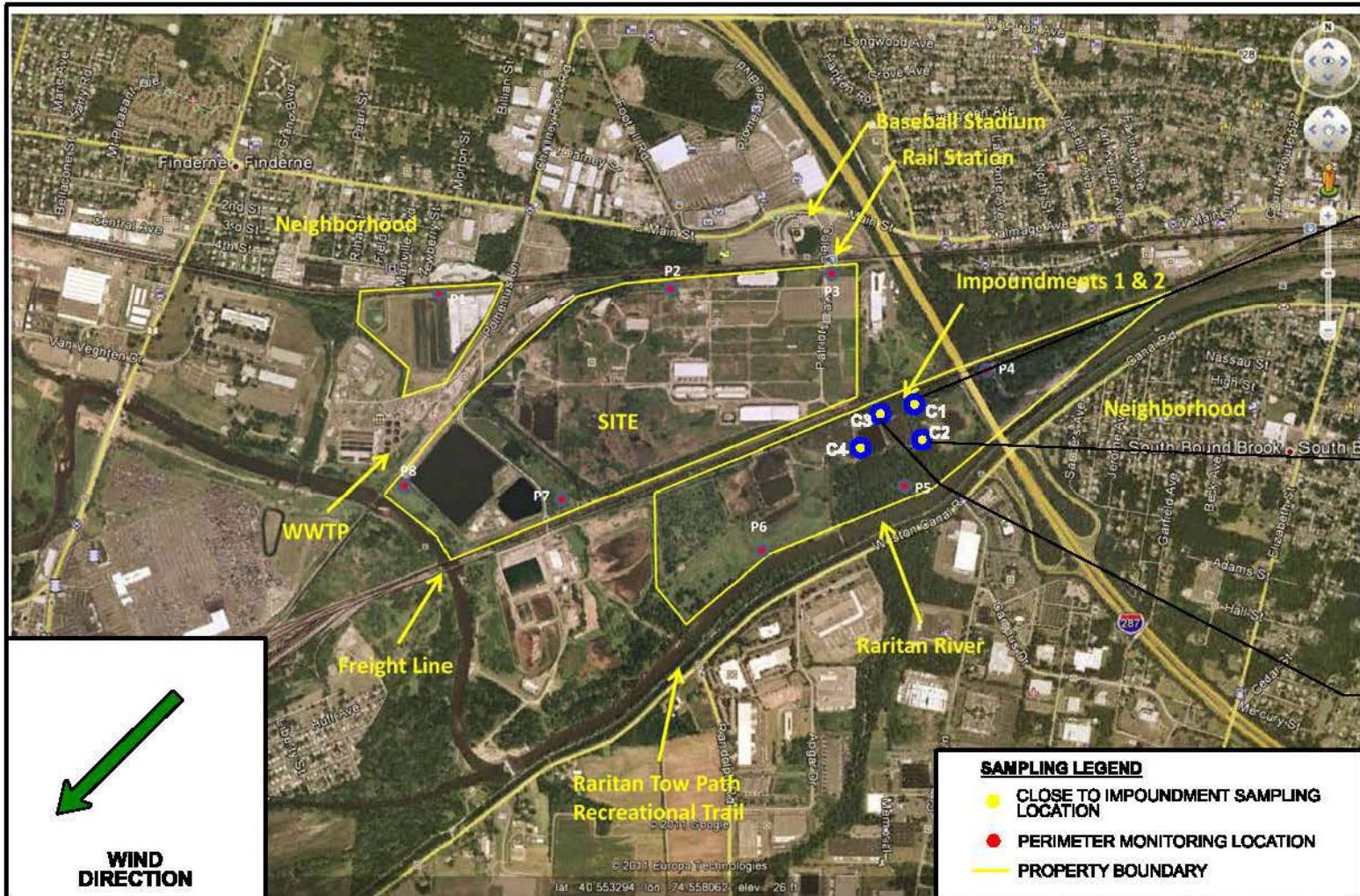


Figure 3
EVALUATION NEAR LOCATION C4
American Cyanamid Superfund Site
Bridgewater, New Jersey

CH2MHILL



C1		
	Analyte (Results in $\mu\text{g}/\text{m}^3$)	
	Formaldehyde	Acetaldehyde
RSL	0.19	1.1
7/20/12	1.1	2.8
10/24/12	1.1	1.4
1/9/13	13	6.8

C2		
	Analyte (Results in $\mu\text{g}/\text{m}^3$)	
	Formaldehyde	Acetaldehyde
RSL	0.19	1.1
7/20/12	2.6	2.2
10/24/12	0.38	*
1/9/13	7.4	6.4

C3		
	Analyte (Results in $\mu\text{g}/\text{m}^3$)	
	Formaldehyde	Acetaldehyde
RSL	0.19	1.1
7/20/12	*	*
10/24/12	0.54	1.4
1/9/13	3	1.9

Notes

1. $\mu\text{g}/\text{m}^3$ = micrograms per cubic meter
2. MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.
3. RSLs are the residential values published May 2012 (http://www.epa.gov/reg3hwmd/risk/human/rbconcentration_table/index.htm)
4. * = Result less than reporting limit.

Figure 4
Pfizer Quarterly Ambient Air Sampling Results
(Formaldehyde and Acetaldehyde)
American Cyanamid Superfund Site
Bridgewater, New Jersey

CH2MHILL

Appendix C

**Quarterly Ambient Air Monitoring Laboratory Data
Sheets (Electronic)**

LABORATORY REPORT

August 1, 2013

Karen Mordock
CH2M Hill
1717 Arch Street, Suite 4400
Philadelphia, PA 19103

RE: Pfizer Ambient Air Monitoring / 431248.AM.FW

Dear Karen:

Your report number P1202952 has been amended for the samples submitted to our laboratory on July 20, 2012. The Privileged and Confidential water mark has been removed from all of the report pages. The revised pages have been indicated by the "Revised Page" footer located at the bottom right of the page.

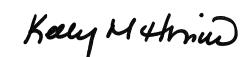
All analyses were performed according to our laboratory's NELAP and DoD-ELAP-approved quality assurance program. The test results meet requirements of the current NELAP and DoD-ELAP standards, where applicable, and except as noted in the laboratory case narrative provided. For a specific list of NELAP and DoD-ELAP-accredited analytes, refer to the certifications section at www.caslab.com. Results are intended to be considered in their entirety and apply only to the samples analyzed and reported herein.

Columbia Analytical Services, Inc. dba ALS Environmental (ALS) is certified by the California Department of Health Services, NELAP Laboratory Certificate No. 02115CA; Arizona Department of Health Services, Certificate No. AZ0694; Florida Department of Health, NELAP Certification E871020; New Jersey Department of Environmental Protection, NELAP Laboratory Certification ID #CA009; New York State Department of Health, NELAP NY Lab ID No: 11221; Oregon Environmental Laboratory Accreditation Program, NELAP ID: CA200007; The American Industrial Hygiene Association, Laboratory #101661; United States Department of Defense Environmental Laboratory Accreditation Program (DoD-ELAP), Certificate No. L11-203; Pennsylvania Registration No. 68-03307; TX Commission of Environmental Quality, NELAP ID T104704413-12-3; Minnesota Department of Health, NELAP Certificate No. 362188; Washington State Department of Ecology, ELAP Lab ID: C946, State of Utah Department of Health, NELAP Certificate No. CA015272011-1; Los Angeles Department of Building and Safety, Approval No: TA00001. Each of the certifications listed above have an explicit Scope of Accreditation that applies to specific matrices/methods/analytes; therefore, please contact me for information corresponding to a particular certification.

If you have any questions, please call me at (805) 526-7161.

Respectfully submitted,

ALS | Environmental


By Kelly Horiuchi at 1:17 pm, Aug 01, 2013

Kelly Horiuchi
Laboratory Director

Client: CH2M Hill
Project: Pfizer Ambient Air Monitoring / 431248.AM.FW

Service Request No: P1202952

CASE NARRATIVE

The samples were received intact under chain of custody on July 20, 2012 and were stored in accordance with the analytical method requirements. Please refer to the sample acceptance check form for additional information. The results reported herein are applicable only to the condition of the samples at the time of sample receipt.

Sulfur Analysis

The samples were analyzed for twenty sulfur compounds per ASTM D 5504-08 using a gas chromatograph equipped with a sulfur chemiluminescence detector (SCD). All compounds with the exception of hydrogen sulfide and carbonyl sulfide are quantitated against the initial calibration curve for methyl mercaptan.

The results of analyses are given in the attached laboratory report. All results are intended to be considered in their entirety, and Columbia Analytical Services, Inc. dba ALS Environmental (ALS) is not responsible for utilization of less than the complete report.

Use of Columbia Analytical Services, Inc. dba ALS Environmental (ALS)'s Name. Client shall not use ALS's name or trademark in any marketing or reporting materials, press releases or in any other manner ("Materials") whatsoever and shall not attribute to AALS any test result, tolerance or specification derived from ALS's data ("Attribution") without ALS's prior written consent, which may be withheld by ALS for any reason in its sole discretion. To request ALS's consent, Client shall provide copies of the proposed Materials or Attribution and describe in writing Client's proposed use of such Materials or Attribution. If ALS has not provided written approval of the Materials or Attribution within ten (10) days of receipt from Client, Client's request to use ALS's name or trademark in any Materials or Attribution shall be deemed denied. ALS may, in its discretion, reasonably charge Client for its time in reviewing Materials or Attribution requests. Client acknowledges and agrees that the unauthorized use of ALS's name or trademark may cause ALS to incur irreparable harm for which the recovery of money damages will be inadequate. Accordingly, Client acknowledges and agrees that a violation shall justify preliminary injunctive relief. For questions contact the laboratory.

DETAIL SUMMARY REPORT

Client: CH2M Hill **Service Request:** P1202952
Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

Date Received: 7/20/2012 **Time Received:** 09:35
ASTM D5504-08 - Sulfur Bag

Client Sample ID	Lab Code	Matrix	Date Collected	Time Collected	
PZAA-C1a-071912	P1202952-001	Air	7/19/2012	17:05	X
PZAA-C1b-071912	P1202952-002	Air	7/19/2012	17:00	X
PZAA-C1c-071912	P1202952-003	Air	7/19/2012	17:20	X
PZAA-C2a-071912	P1202952-004	Air	7/19/2012	17:47	X
PZAA-C2b-071912	P1202952-005	Air	7/19/2012	17:45	X
PZAA-C2c-071912	P1202952-006	Air	7/19/2012	17:58	X
PZAA-C3a-071912	P1202952-007	Air	7/19/2012	15:57	X
PZAA-C3b-071912	P1202952-008	Air	7/19/2012	16:15	X
PZAA-C3c-071912	P1202952-009	Air	7/19/2012	16:12	X

Air - Chain of Custody Record & Analytical Service Request

Page 1 of 1

Requested Turnaround Time in Business Days (Surcharges) please circle							CAS Project No.
1 Day (100%) 2 Day (75%) 3 Day (50%) 4 Day (35%) 5 Day (25%) 10 Day-Standard							CAS Contact: K. Horvath
Project Name Pfizer Ambient Air Monitoring							
Project Number 431248.AM.FW							P.O. # / Billing Information

Company Name & Address (Reporting Information)	1717 Arch Street, Suite 4100 Philadelphia, PA 19103						
Project Manager	Karen Nordock						
Phone	267.695.0198						
Fax	215.140.9212						
Email Address for Result Reporting	Karen.mordock@chn2m.com						
Sampler (Print & Sign)	Leslie Baecher						
Client Sample ID	Laboratory ID Number	Date Collected	Time Collected	Canister ID (Bar code # - AC, SC, etc.)	Flow Controller ID (Bar code # - FC#)	Canister Start Pressure "Hg	Canister End Pressure "Hg/psig
PZAA-C1a-071912	(1)	7.19.12	1705			5-7L	X
PZAA-C1b-071912	(2)	7.19.12	1700			5-7L	X
PZAA-C1c-071912	(3)	7.19.12	1720			5-7L	X
PZAA-C2a-071912	(4)	7.19.12	1747			8-7L	X
PZAA-C2b-071912	(5)	7.19.12	1745			5-7L	X
PZAA-C2c-071912	(6)	7.19.12	1758			5-7L	X
PZAA-C3a-071912	(7)	7.19.12	1557			5-7L	X
PZAA-C3b-071912	(8)	7.19.12	1615			5-7L	X
PZAA-C3c-071912	(9)	7.19.12	1612			5-7L	X

Comments
e.g. Actual Preservative or specific instructions

ASTM D5504
Reduced Sulfur Compounds + H₂S

Report Tier Levels - please select

Tier I - Results (Default if not specified) **Per SOW**

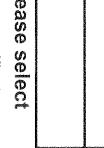
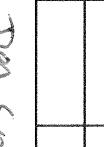
Tier II (Results + QC Summaries) _____

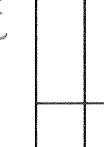
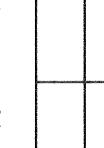
Tier III (Results + QC & Calibration Summaries) _____

Tier IV (Data Validation Package) 10% Surcharge _____

EDD required Yes / No

Type: _____

Relinquished by: (Signature)  Received by: (Signature) 

Relinquished by: (Signature)  Date: **7/19/12** Time: _____ Received by: (Signature) 

Project Requirements (MRLs, QAPP)

Date: **7/19/12** Time: _____ Cooler / Blank Temperature _____ °C

Sample Acceptance Check Form

 Client: CH2M Hill

 Work order: P1202952

 Project: Pfizer Ambient Air Monitoring / 431248.AM.FW

 Sample(s) received on: 7/20/12

 Date opened: 7/20/12

 by: MZAMORA

Note: This form is used for all samples received by CAS. The use of this form for custody seals is strictly meant to indicate presence/absence and not as an indication of compliance or nonconformity. Thermal preservation and pH will only be evaluated either at the request of the client and/or as required by the method/SOP.

Yes **No** **N/A**

- 1 Were **sample containers** properly marked with client sample ID?
- 2 Container(s) **supplied by CAS?**
- 3 Did **sample containers** arrive in good condition?
- 4 Were **chain-of-custody** papers used and filled out?
- 5 Did **sample container labels** and/or tags agree with custody papers?
- 6 Was **sample volume** received adequate for analysis?
- 7 Are samples within specified holding times?
- 8 Was proper **temperature** (thermal preservation) of cooler at receipt adhered to?

- 9 Was a **trip blank** received?
- 10 Were **custody seals** on outside of cooler/Box?
 Location of seal(s)? Top of box, down the sides. Sealing Lid?
 Were signature and date included?
 Were seals intact?
 Were custody seals on outside of sample container?
 Location of seal(s)? _____ Sealing Lid?
 Were signature and date included?
 Were seals intact?
- 11 Do containers have appropriate **preservation**, according to method/SOP or Client specified information?
 Is there a client indication that the submitted samples are **pH** preserved?
 Were **VOA vials** checked for presence/absence of air bubbles?
 Does the client/method/SOP require that the analyst check the sample pH and if necessary alter it?
- 12 **Tubes:** Are the tubes capped and intact?
 Do they contain moisture?
- 13 **Badges:** Are the badges properly capped and intact?
 Are dual bed badges separated and individually capped and intact?

Lab Sample ID	Container Description	Required pH *	Received pH	Adjusted pH	VOA Headspace (Presence/Absence)	Receipt / Preservation Comments
P1202952-001.01	10 L Tedlar Bag					
P1202952-002.01	10 L Tedlar Bag					
P1202952-003.01	10 L Tedlar Bag					
P1202952-004.01	10 L Tedlar Bag					
P1202952-005.01	10 L Tedlar Bag					
P1202952-006.01	10 L Tedlar Bag					
P1202952-007.01	10 L Tedlar Bag					
P1202952-008.01	10 L Tedlar Bag					

Explain any discrepancies: (include lab sample ID numbers): _____

RSK - MEEPP, HCL (pH<2); RSK - CO2, (pH 5-8); Sulfur (pH>4)

Sample Acceptance Check Form

Client: CH2M Hill

Work order: P1202952

Project: Pfizer Ambient Air Monitoring / 431248.AM.FW

Sample(s) received on: 7/20/12

Date opened: 7/20/12

by: MZAMORA

Explain any discrepancies: (include lab sample ID numbers):

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C1a-071912

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1202952

CAS Sample ID: P1202952-001

Test Code: ASTM D 5504-08
Instrument ID: Agilent 6890A/GC13/SCD
Analyst: Wade Henton
Sampling Media: 10 L Tedlar Bag
Test Notes:

Date Collected: 7/19/12
Time Collected: 17:05
Date Received: 7/20/12
Date Analyzed: 7/20/12
Time Analyzed: 13:11
Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C1b-071912

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1202952

CAS Sample ID: P1202952-002

Test Code: ASTM D 5504-08
Instrument ID: Agilent 6890A/GC13/SCD
Analyst: Wade Henton
Sampling Media: 10 L Tedlar Bag
Test Notes:

Date Collected: 7/19/12
Time Collected: 17:00
Date Received: 7/20/12
Date Analyzed: 7/20/12
Time Analyzed: 12:47
Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C1c-071912

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1202952

CAS Sample ID: P1202952-003

Test Code: ASTM D 5504-08
Instrument ID: Agilent 6890A/GC13/SCD
Analyst: Wade Henton
Sampling Media: 10 L Tedlar Bag
Test Notes:

Date Collected: 7/19/12
Time Collected: 17:20
Date Received: 7/20/12
Date Analyzed: 7/20/12
Time Analyzed: 14:03
Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C2a-071912

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1202952

CAS Sample ID: P1202952-004

Test Code: ASTM D 5504-08
Instrument ID: Agilent 6890A/GC13/SCD
Analyst: Wade Henton
Sampling Media: 10 L Tedlar Bag
Test Notes:

Date Collected: 7/19/12
Time Collected: 17:47
Date Received: 7/20/12
Date Analyzed: 7/20/12
Time Analyzed: 14:20
Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C2b-071912

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1202952

CAS Sample ID: P1202952-005

Test Code: ASTM D 5504-08
Instrument ID: Agilent 6890A/GC13/SCD
Analyst: Wade Henton
Sampling Media: 10 L Tedlar Bag
Test Notes:

Date Collected: 7/19/12
Time Collected: 17:45
Date Received: 7/20/12
Date Analyzed: 7/20/12
Time Analyzed: 14:39
Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C2c-071912

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1202952

CAS Sample ID: P1202952-006

Test Code: ASTM D 5504-08
Instrument ID: Agilent 6890A/GC13/SCD
Analyst: Wade Henton
Sampling Media: 10 L Tedlar Bag
Test Notes:

Date Collected: 7/19/12
Time Collected: 17:58
Date Received: 7/20/12
Date Analyzed: 7/20/12
Time Analyzed: 14:59
Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C3a-071912

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1202952

CAS Sample ID: P1202952-007

Test Code: ASTM D 5504-08
Instrument ID: Agilent 6890A/GC13/SCD
Analyst: Wade Henton
Sampling Media: 10 L Tedlar Bag
Test Notes:

Date Collected: 7/19/12
Time Collected: 15:57
Date Received: 7/20/12
Date Analyzed: 7/20/12
Time Analyzed: 11:49
Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C3b-071912

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1202952

CAS Sample ID: P1202952-008

Test Code: ASTM D 5504-08
Instrument ID: Agilent 6890A/GC13/SCD
Analyst: Wade Henton
Sampling Media: 10 L Tedlar Bag
Test Notes:

Date Collected: 7/19/12
Time Collected: 16:15
Date Received: 7/20/12
Date Analyzed: 7/20/12
Time Analyzed: 12:28
Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C3c-071912

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1202952

CAS Sample ID: P1202952-009

Test Code: ASTM D 5504-08
Instrument ID: Agilent 6890A/GC13/SCD
Analyst: Wade Henton
Sampling Media: 10 L Tedlar Bag
Test Notes:

Date Collected: 7/19/12
Time Collected: 16:12
Date Received: 7/20/12
Date Analyzed: 7/20/12
Time Analyzed: 12:08
Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: Method Blank

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1202952

CAS Sample ID: P120720-MB

Test Code: ASTM D 5504-08
 Instrument ID: Agilent 6890A/GC13/SCD
 Analyst: Wade Henton
 Sampling Media: 10 L Tedlar Bag
 Test Notes:

Date Collected: NA
 Time Collected: NA
 Date Received: NA
 Date Analyzed: 7/20/12
 Time Analyzed: 08:44
 Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

LABORATORY CONTROL SAMPLE SUMMARY

Page 1 of 1

Client: CH2M Hill

Client Sample ID: Lab Control Sample

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1202952

CAS Sample ID: P120720-LCS

Test Code: ASTM D 5504-08

Date Collected: NA

Instrument ID: Agilent 6890A/GC13/SCD

Date Received: NA

Analyst: Wade Henton

Date Analyzed: 7/20/12

Sampling Media: 10 L Tedlar Bag

Volume(s) Analyzed: NA ml(s)

Test Notes:

CAS #	Compound	Spike Amount	Result µg/m³	% Recovery	CAS	
		µg/m³			Acceptance Limits	Data Qualifier
7783-06-4	Hydrogen Sulfide	3,310	3,910	118	51-141	
463-58-1	Carbonyl Sulfide	6,070	5,630	93	63-147	
74-93-1	Methyl Mercaptan	4,640	6,150	133	54-156	

LABORATORY REPORT

August 1, 2013

Karen Mordock
CH2M Hill
1717 Arch Street, Suite 4400
Philadelphia, PA 19103

RE: Pfizer - Bridgewater, NJ

Dear Karen:

Your report number P1203000 has been amended for the samples submitted to our laboratory on July 24, 2012. The Privileged and Confidential water mark has been removed from all of the report pages. The revised pages have been indicated by the "Revised Page" footer located at the bottom right of the page.

All analyses were performed according to our laboratory's NELAP and DoD-ELAP-approved quality assurance program. The test results meet requirements of the current NELAP and DoD-ELAP standards, where applicable, and except as noted in the laboratory case narrative provided. For a specific list of NELAP and DoD-ELAP-accredited analytes, refer to the certifications section at www.caslab.com. Results are intended to be considered in their entirety and apply only to the samples analyzed and reported herein.

Columbia Analytical Services, Inc. dba ALS Environmental (ALS) is certified by the California Department of Health Services, NELAP Laboratory Certificate No. 02115CA; Arizona Department of Health Services, Certificate No. AZ0694; Florida Department of Health, NELAP Certification E871020; New Jersey Department of Environmental Protection, NELAP Laboratory Certification ID #CA009; New York State Department of Health, NELAP NY Lab ID No: 11221; Oregon Environmental Laboratory Accreditation Program, NELAP ID: CA200007; The American Industrial Hygiene Association, Laboratory #101661; United States Department of Defense Environmental Laboratory Accreditation Program (DoD-ELAP), Certificate No. L11-203; Pennsylvania Registration No. 68-03307; TX Commission of Environmental Quality, NELAP ID T104704413-12-3; Minnesota Department of Health, NELAP Certificate No. 362188; Washington State Department of Ecology, ELAP Lab ID: C946, State of Utah Department of Health, NELAP Certificate No. CA01527Z012-Z; Los Angeles Department of Building and Safety, Approval No: TA00001. Each of the certifications listed above have an explicit Scope of Accreditation that applies to specific matrices/methods/analytes; therefore, please contact me for information corresponding to a particular certification.

If you have any questions, please call me at (805) 526-7161.

Respectfully submitted,

ALS | Environmental


By Kelly Horiuchi at 1:18 pm, Aug 01, 2013

Kelly Horiuchi
Laboratory Director

Client: CH2M Hill
Project: Pfizer - Bridgewater, NJ

Service Request No: P1203000

CASE NARRATIVE

The samples were received intact under chain of custody on July 24, 2012 and were stored in accordance with the analytical method requirements. Please refer to the sample acceptance check form for additional information. The results reported herein are applicable only to the condition of the samples at the time of sample receipt.

Aldehyde Analysis

The DNPH silica gel tube samples were analyzed for aldehydes according to EPA Method TO-11A using high performance liquid chromatography (HPLC).

The sample tubes labeled PZAA-C2-072012 and PZAA-C1-072012 were received wet and were not capped, but instead they were wrapped in aluminum foil.

Polynuclear Aromatic Hydrocarbon Analysis

The low volume PUF/XAD-2 samples were analyzed for polynuclear aromatic hydrocarbons (PAHs). The extracts were analyzed according to the methodology outlined in EPA Method TO-13A using combined gas chromatography/mass spectrometry (GC/MS). However, the method was modified for the use of the low volume PUF/XAD-2 sample collection materials.

NELAC requirements for compliance with EPA TO-13A state a duplicate sample must be analyzed. However, this is dependent upon the client submitting a secondary sample for extraction and analysis. Sample extraction was performed at the laboratory's off-site extraction facility located at 2360 Shasta Way, Suite G, Simi Valley, CA 93065.

The results of analyses are given in the attached laboratory report. All results are intended to be considered in their entirety, and Columbia Analytical Services, Inc. dba ALS Environmental (ALS) is not responsible for utilization of less than the complete report.

Use of Columbia Analytical Services, Inc. dba ALS Environmental (ALS)'s Name. Client shall not use ALS's name or trademark in any marketing or reporting materials, press releases or in any other manner ("Materials") whatsoever and shall not attribute to AALS any test result, tolerance or specification derived from ALS's data ("Attribution") without ALS's prior written consent, which may be withheld by ALS for any reason in its sole discretion. To request ALS's consent, Client shall provide copies of the proposed Materials or Attribution and describe in writing Client's proposed use of such Materials or Attribution. If ALS has not provided written approval of the Materials or Attribution within ten (10) days of receipt from Client, Client's request to use ALS's name or trademark in any Materials or Attribution shall be deemed denied. ALS may, in its discretion, reasonably charge Client for its time in reviewing Materials or Attribution requests. Client acknowledges and agrees that the unauthorized use of ALS's name or trademark may cause ALS to incur irreparable harm for which the recovery of money damages will be inadequate. Accordingly, Client acknowledges and agrees that a violation shall justify preliminary injunctive relief. For questions contact the laboratory.

DETAIL SUMMARY REPORT

Client: CH2M Hill
 Project ID: Pfizer - Bridgewater, NJ

Service Request: P1203000

Date Received: 7/24/2012
 Time Received: 10:10

TO-13A Modified - PAH SIM Low Vol	TO-11A - Carbonyls
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Client Sample ID	Lab Code	Matrix	Date Collected	Time Collected	
PZAA-C2-072012	P1203000-001	Air	7/20/2012	18:23	X
PZAA-C2-072012	P1203000-002	Air	7/20/2012	18:23	X
PZAA-C1-072012	P1203000-003	Air	7/20/2012	18:14	X
PZAA-C1-072012	P1203000-004	Air	7/20/2012	18:14	X
PZAA-C3-072012	P1203000-005	Air	7/20/2012	15:35	X
PZAA-C3-072012-D	P1203000-006	Air	7/20/2012	15:35	X



ANALYTICAL REQUEST FORM

 REGULAR Status

PI2D3000

 RUSH Status Required - ADDITIONAL CHARGE

RESULTS REQUIRED BY _____ DATE _____

CONTACT ALS LABORATORY GROUP PRIOR TO SENDING SAMPLES

Date 7/23 Purchase Order No. _____

Billing Address (if different) _____

Company Name CH2M Hill

Sample Acceptance Check Form

 Client: CH2M Hill

 Work order: P1203000

 Project: Pfizer - Bridgewater, NJ

 Sample(s) received on: 7/24/12

 Date opened: 7/24/12

 by: MZAMORA

Note: This form is used for all samples received by CAS. The use of this form for custody seals is strictly meant to indicate presence/absence and not as an indication of compliance or nonconformity. Thermal preservation and pH will only be evaluated either at the request of the client and/or as required by the method/SOP.

Yes No N/A

- 1 Were **sample containers** properly marked with client sample ID?
- 2 Container(s) **supplied by CAS?**
- 3 Did **sample containers** arrive in good condition?
- 4 Were **chain-of-custody** papers used and filled out?
- 5 Did **sample container labels** and/or tags agree with custody papers?
- 6 Was **sample volume** received adequate for analysis?
- 7 Are samples within specified holding times?
- 8 Was proper **temperature** (thermal preservation) of cooler at receipt adhered to?

 Cooler Temperature: 6° C Blank Temperature: ° C
Gel Packs

- 9 Was a **trip blank** received?
- 10 Were **custody seals** on outside of cooler/Box?

Location of seal(s)? _____

Sealing Lid?

Were signature and date included?

Were seals intact?

Were custody seals on outside of sample container?

Location of seal(s)? _____

Sealing Lid?

Were signature and date included?

Were seals intact?

- 11 Do containers have appropriate **preservation**, according to method/SOP or Client specified information?

 Is there a client indication that the submitted samples are **pH** preserved?

 Were **VOA vials** checked for presence/absence of air bubbles?

 Does the client/method/SOP require that the analyst check the sample pH and if necessary alter it?

- 12 **Tubes:** Are the tubes capped and intact?

 Do they contain moisture?

- 13 **Badges:** Are the badges properly capped and intact?

 Are dual bed badges separated and individually capped and intact?

Lab Sample ID	Container Description	Required pH *	Received pH	Adjusted pH	VOA Headspace (Presence/Absence)	Receipt / Preservation Comments
P1203000-001.01	PUF/XAD-2 (Low Vol)					
P1203000-002.01	Silica Gel DNPB Tube					
P1203000-003.01	PUF/XAD-2 (Low Vol)					
P1203000-004.01	Silica Gel DNPB Tube					
P1203000-005.01	PUF/XAD-2 (Low Vol)					
P1203000-006.01	PUF/XAD-2 (Low Vol)					

Explain any discrepancies: (include lab sample ID numbers): _____

PM10 filter listed on COC, was not logged in and was sent to ALS Cincinnati.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C2-072012

Client Project ID: Pfizer - Bridgewater, NJ

CAS Project ID: P1203000

CAS Sample ID: P1203000-002

Test Code: EPA Method TO-11A
 Instrument ID: Agilent Infinity LC 1220/LC3
 Analyst: Madeleine Dangazyan
 Sampling Media: Silica Gel DNPH Tube
 Test Notes: BC

Date Collected: 7/20/12
 Date Received: 7/24/12
 Date Analyzed: 7/30/12
 Desorption Volume: 1.0 ml
 Volume Sampled: 1736 Liter(s)

CAS #	Compound	Result ng/Sample	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
50-00-0	Formaldehyde	4,800	2.8	0.058	2.3	0.047	
75-07-0	Acetaldehyde	4,000	2.3	0.058	1.3	0.032	BT
123-38-6	Propionaldehyde	< 100		ND	0.058	ND	0.024
4170-30-3	Crotonaldehyde, Total	< 100		ND	0.058	ND	0.020
123-72-8	Butyraldehyde	< 100		ND	0.058	ND	0.020
100-52-7	Benzaldehyde	< 100		ND	0.058	ND	0.013
590-86-3	Isovaleraldehyde	< 100		ND	0.058	ND	0.016
110-62-3	Valeraldehyde	260	0.15	0.058	0.042	0.016	
529-20-4	o-Tolualdehyde	< 100		ND	0.058	ND	0.012
620-23-5							
104-87-0	m,p-Tolualdehyde	< 200		ND	0.12	ND	0.023
66-25-1	n-Hexaldehyde	< 100		ND	0.058	ND	0.014
5779-94-2	2,5-Dimethylbenzaldehyde	290	0.17	0.058	0.031	0.011	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

BC = Results reported are not blank corrected.

BT = Results indicated possible breakthrough; back section > 10% front section.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C1-072012

Client Project ID: Pfizer - Bridgewater, NJ

CAS Project ID: P1203000

CAS Sample ID: P1203000-004

Test Code: EPA Method TO-11A
 Instrument ID: Agilent Infinity LC 1220/LC3
 Analyst: Madeleine Dangazyan
 Sampling Media: Silica Gel DNPH Tube
 Test Notes: BC

Date Collected: 7/20/12
 Date Received: 7/24/12
 Date Analyzed: 7/30/12
 Desorption Volume: 1.0 ml
 Volume Sampled: 1742 Liter(s)

CAS #	Compound	Result ng/Sample	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
50-00-0	Formaldehyde	1,900	1.1	0.057	0.90	0.047	
75-07-0	Acetaldehyde	5,000	2.9	0.057	1.6	0.032	BT
123-38-6	Propionaldehyde	< 100	ND	0.057	ND	0.024	
4170-30-3	Crotonaldehyde, Total	< 100	ND	0.057	ND	0.020	
123-72-8	Butyraldehyde	< 100	ND	0.057	ND	0.019	
100-52-7	Benzaldehyde	110	0.063	0.057	0.014	0.013	
590-86-3	Isovaleraldehyde	< 100	ND	0.057	ND	0.016	
110-62-3	Valeraldehyde	160	0.093	0.057	0.027	0.016	
529-20-4	o-Tolualdehyde	< 100	ND	0.057	ND	0.012	
620-23-5							
104-87-0	m,p-Tolualdehyde	< 200	ND	0.11	ND	0.023	
66-25-1	n-Hexaldehyde	< 100	ND	0.057	ND	0.014	
5779-94-2	2,5-Dimethylbenzaldehyde	210	0.12	0.057	0.022	0.010	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

BC = Results reported are not blank corrected.

BT = Results indicated possible breakthrough; back section > 10% front section.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C2-072012

Client Project ID: Pfizer - Bridgewater, NJ

CAS Project ID: P1203000

CAS Sample ID: P1203000-001

Test Code: EPA TO-13A Modified
 Instrument ID: HP 5890II+/HP5972A/MS15
 Analyst: Madeleine Dangazyan
 Sampling Media: PUF/XAD-2 (Low Volume) Cartridge
 Test Notes:

Date Collected: 7/20/12
 Date Received: 7/24/12
 Date Extracted: 7/26/12
 Date Analyzed: 7/30/12
 Final Volume: 1.0 ml
 Volume Sampled: 7193 Liter(s)

CAS #	Compound	Result µg/Cartridge	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
91-20-3	Naphthalene	< 5.0	ND	0.70	ND	0.13	
208-96-8	Acenaphthylene	< 0.50	ND	0.070	ND	0.011	
83-32-9	Acenaphthene	< 0.50	ND	0.070	ND	0.011	
86-73-7	Fluorene	< 0.50	ND	0.070	ND	0.010	
85-01-8	Phenanthrene	< 0.50	ND	0.070	ND	0.0095	
120-12-7	Anthracene	< 0.50	ND	0.070	ND	0.0095	
206-44-0	Fluoranthene	< 0.50	ND	0.070	ND	0.0084	
129-00-0	Pyrene	< 0.50	ND	0.070	ND	0.0084	
56-55-3	Benz(a)anthracene	< 0.50	ND	0.070	ND	0.0074	
218-01-9	Chrysene	< 0.50	ND	0.070	ND	0.0074	
205-99-2	Benzo(b)fluoranthene	< 0.50	ND	0.070	ND	0.0067	L
207-08-9	Benzo(k)fluoranthene	< 0.50	ND	0.070	ND	0.0067	
50-32-8	Benzo(a)pyrene	< 0.50	ND	0.070	ND	0.0067	
193-39-5	Indeno(1,2,3-cd)pyrene	< 0.50	ND	0.070	ND	0.0062	
53-70-3	Dibenz(a,h)anthracene	< 0.50	ND	0.070	ND	0.0061	
191-24-2	Benzo(g,h,i)perylene	< 0.50	ND	0.070	ND	0.0062	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

L = Laboratory control sample recovery outside the specified limits.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C1-072012

Client Project ID: Pfizer - Bridgewater, NJ

CAS Project ID: P1203000

CAS Sample ID: P1203000-003

Test Code: EPA TO-13A Modified
 Instrument ID: HP 5890II+/HP5972A/MS15
 Analyst: Madeleine Dangazyan
 Sampling Media: PUF/XAD-2 (Low Volume) Cartridge
 Test Notes:

Date Collected: 7/20/12
 Date Received: 7/24/12
 Date Extracted: 7/26/12
 Date Analyzed: 7/30/12
 Final Volume: 1.0 ml
 Volume Sampled: 7211 Liter(s)

CAS #	Compound	Result µg/Cartridge	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
91-20-3	Naphthalene	< 5.0	ND	0.69	ND	0.13	
208-96-8	Acenaphthylene	< 0.50	ND	0.069	ND	0.011	
83-32-9	Acenaphthene	< 0.50	ND	0.069	ND	0.011	
86-73-7	Fluorene	< 0.50	ND	0.069	ND	0.010	
85-01-8	Phenanthrene	< 0.50	ND	0.069	ND	0.0095	
120-12-7	Anthracene	< 0.50	ND	0.069	ND	0.0095	
206-44-0	Fluoranthene	< 0.50	ND	0.069	ND	0.0084	
129-00-0	Pyrene	< 0.50	ND	0.069	ND	0.0084	
56-55-3	Benz(a)anthracene	< 0.50	ND	0.069	ND	0.0074	
218-01-9	Chrysene	< 0.50	ND	0.069	ND	0.0074	
205-99-2	Benzo(b)fluoranthene	< 0.50	ND	0.069	ND	0.0067	L
207-08-9	Benzo(k)fluoranthene	< 0.50	ND	0.069	ND	0.0067	
50-32-8	Benzo(a)pyrene	< 0.50	ND	0.069	ND	0.0067	
193-39-5	Indeno(1,2,3-cd)pyrene	< 0.50	ND	0.069	ND	0.0061	
53-70-3	Dibenz(a,h)anthracene	< 0.50	ND	0.069	ND	0.0061	
191-24-2	Benzo(g,h,i)perylene	< 0.50	ND	0.069	ND	0.0061	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

L = Laboratory control sample recovery outside the specified limits.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C3-072012

Client Project ID: Pfizer - Bridgewater, NJ

CAS Project ID: P1203000

CAS Sample ID: P1203000-005

Test Code: EPA TO-13A Modified
 Instrument ID: HP 5890II+/HP5972A/MS15
 Analyst: Madeleine Dangazyan
 Sampling Media: PUF/XAD-2 (Low Volume) Cartridge
 Test Notes:

Date Collected: 7/20/12
 Date Received: 7/24/12
 Date Extracted: 7/26/12
 Date Analyzed: 7/30/12
 Final Volume: 1.0 ml
 Volume Sampled: 7212 Liter(s)

CAS #	Compound	Result µg/Cartridge	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
91-20-3	Naphthalene	< 5.0	ND	0.69	ND	0.13	
208-96-8	Acenaphthylene	< 0.50	ND	0.069	ND	0.011	
83-32-9	Acenaphthene	< 0.50	ND	0.069	ND	0.011	
86-73-7	Fluorene	< 0.50	ND	0.069	ND	0.010	
85-01-8	Phenanthrene	< 0.50	ND	0.069	ND	0.0095	
120-12-7	Anthracene	< 0.50	ND	0.069	ND	0.0095	
206-44-0	Fluoranthene	< 0.50	ND	0.069	ND	0.0084	
129-00-0	Pyrene	< 0.50	ND	0.069	ND	0.0084	
56-55-3	Benz(a)anthracene	< 0.50	ND	0.069	ND	0.0074	
218-01-9	Chrysene	< 0.50	ND	0.069	ND	0.0074	
205-99-2	Benzo(b)fluoranthene	< 0.50	ND	0.069	ND	0.0067	L
207-08-9	Benzo(k)fluoranthene	< 0.50	ND	0.069	ND	0.0067	
50-32-8	Benzo(a)pyrene	< 0.50	ND	0.069	ND	0.0067	
193-39-5	Indeno(1,2,3-cd)pyrene	< 0.50	ND	0.069	ND	0.0061	
53-70-3	Dibenz(a,h)anthracene	< 0.50	ND	0.069	ND	0.0061	
191-24-2	Benzo(g,h,i)perylene	< 0.50	ND	0.069	ND	0.0061	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

L = Laboratory control sample recovery outside the specified limits.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C3-072012-D

Client Project ID: Pfizer - Bridgewater, NJ

CAS Project ID: P1203000

CAS Sample ID: P1203000-006

Test Code: EPA TO-13A Modified

Date Collected: 7/20/12

Instrument ID: HP 5890II+/HP5972A/MS15

Date Received: 7/24/12

Analyst: Madeleine Dangazyan

Date Extracted: 7/26/12

Sampling Media: PUF/XAD-2 (Low Volume) Cartridge

Date Analyzed: 7/30/12

Test Notes:

Final Volume: 1.0 ml

Volume Sampled: 7248 Liter(s)

CAS #	Compound	Result µg/Cartridge	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
91-20-3	Naphthalene	< 5.0	ND	0.69	ND	0.13	
208-96-8	Acenaphthylene	< 0.50	ND	0.069	ND	0.011	
83-32-9	Acenaphthene	< 0.50	ND	0.069	ND	0.011	
86-73-7	Fluorene	< 0.50	ND	0.069	ND	0.010	
85-01-8	Phenanthrene	< 0.50	ND	0.069	ND	0.0095	
120-12-7	Anthracene	< 0.50	ND	0.069	ND	0.0095	
206-44-0	Fluoranthene	< 0.50	ND	0.069	ND	0.0083	
129-00-0	Pyrene	< 0.50	ND	0.069	ND	0.0083	
56-55-3	Benz(a)anthracene	< 0.50	ND	0.069	ND	0.0074	
218-01-9	Chrysene	< 0.50	ND	0.069	ND	0.0074	
205-99-2	Benzo(b)fluoranthene	< 0.50	ND	0.069	ND	0.0067	L
207-08-9	Benzo(k)fluoranthene	< 0.50	ND	0.069	ND	0.0067	
50-32-8	Benzo(a)pyrene	< 0.50	ND	0.069	ND	0.0067	
193-39-5	Indeno(1,2,3-cd)pyrene	< 0.50	ND	0.069	ND	0.0061	
53-70-3	Dibenz(a,h)anthracene	< 0.50	ND	0.069	ND	0.0061	
191-24-2	Benzo(g,h,i)perylene	< 0.50	ND	0.069	ND	0.0061	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

L = Laboratory control sample recovery outside the specified limits.

LABORATORY REPORT

August 1, 2013

Karen Mordock
CH2M Hill
1717 Arch Street, Suite 4400
Philadelphia, PA 19103

RE: Pfizer Ambient Air Monitoring / 431248.AM.FW

Dear Karen:

Your report number P1203007 has been amended for the samples submitted to our laboratory on July 24, 2012. The Privileged and Confidential water mark has been removed from all of the report pages. The revised pages have been indicated by the "Revised Page" footer located at the bottom right of the page.

All analyses were performed according to our laboratory's NELAP and DoD-ELAP-approved quality assurance program. The test results meet requirements of the current NELAP and DoD-ELAP standards, where applicable, and except as noted in the laboratory case narrative provided. For a specific list of NELAP and DoD-ELAP-accredited analytes, refer to the certifications section at www.caslab.com. Results are intended to be considered in their entirety and apply only to the samples analyzed and reported herein.

Columbia Analytical Services, Inc. dba ALS Environmental (ALS) is certified by the California Department of Health Services, NELAP Laboratory Certificate No. 02115CA; Arizona Department of Health Services, Certificate No. AZ0694; Florida Department of Health, NELAP Certification E871020; New Jersey Department of Environmental Protection, NELAP Laboratory Certification ID #CA009; New York State Department of Health, NELAP NY Lab ID No: 11221; Oregon Environmental Laboratory Accreditation Program, NELAP ID: CA200007; The American Industrial Hygiene Association, Laboratory #101661; United States Department of Defense Environmental Laboratory Accreditation Program (DoD-ELAP), Certificate No. L11-203; Pennsylvania Registration No. 68-03307; TX Commission of Environmental Quality, NELAP ID T104704413-12-3; Minnesota Department of Health, NELAP Certificate No. 362188; Washington State Department of Ecology, ELAP Lab ID: C946, State of Utah Department of Health, NELAP Certificate No. CA01527Z012-Z; Los Angeles Department of Building and Safety, Approval No: TA00001. Each of the certifications listed above have an explicit Scope of Accreditation that applies to specific matrices/methods/analytes; therefore, please contact me for information corresponding to a particular certification.

If you have any questions, please call me at (805) 526-7161.

Respectfully submitted,

ALS | Environmental



By Kelly Horiuchi at 1:20 pm, Aug 01, 2013

Kelly Horiuchi
Laboratory Director

Client: CH2M Hill Service Request No: P1203007
Project: Pfizer Ambient Air Monitoring / 431248.AM.FW

CASE NARRATIVE

The samples were received intact under chain of custody on July 24, 2012 and were stored in accordance with the analytical method requirements. Please refer to the sample acceptance check form for additional information. The results reported herein are applicable only to the condition of the samples at the time of sample receipt.

Volatile Organic Compound Analysis

The samples were analyzed for volatile organic compounds in accordance with EPA Method TO-15 from the Compendium of Methods for the Determination of Toxic Organic Compounds in Ambient Air, Second Edition (EPA/625/R-96/010b), January, 1999. The analytical system was comprised of a gas chromatograph / mass spectrometer (GC/MS) interfaced to a whole-air preconcentrator.

The results of analyses are given in the attached laboratory report. All results are intended to be considered in their entirety, and Columbia Analytical Services, Inc. dba ALS Environmental (ALS) is not responsible for utilization of less than the complete report.

Use of Columbia Analytical Services, Inc. dba ALS Environmental (ALS)'s Name. Client shall not use ALS's name or trademark in any marketing or reporting materials, press releases or in any other manner ("Materials") whatsoever and shall not attribute to AALS any test result, tolerance or specification derived from ALS's data ("Attribution") without ALS's prior written consent, which may be withheld by ALS for any reason in its sole discretion. To request ALS's consent, Client shall provide copies of the proposed Materials or Attribution and describe in writing Client's proposed use of such Materials or Attribution. If ALS has not provided written approval of the Materials or Attribution within ten (10) days of receipt from Client, Client's request to use ALS's name or trademark in any Materials or Attribution shall be deemed denied. ALS may, in its discretion, reasonably charge Client for its time in reviewing Materials or Attribution requests. Client acknowledges and agrees that the unauthorized use of ALS's name or trademark may cause ALS to incur irreparable harm for which the recovery of money damages will be inadequate. Accordingly, Client acknowledges and agrees that a violation shall justify preliminary injunctive relief. For questions contact the laboratory.

DETAIL SUMMARY REPORT

Client: CH2M Hill
 Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW
 Service Request: P1203007
 Date Received: 7/24/2012
 Time Received: 09:30



TO-15 - VOC Cans

Client Sample ID	Lab Code	Matrix	Date Collected	Time Collected	Container ID	Pi1 (psig)	Pf1 (psig)	
PZAA-P1-072012	P1203007-001	Air	7/20/2012	14:55	AC01243	-2.08	3.71	X
PZAA-P2-072012	P1203007-002	Air	7/20/2012	15:10	AC01893	-2.89	3.52	X
PZAA-P3-072012	P1203007-003	Air	7/20/2012	10:18	AC01462	-2.50	3.65	X
PZAA-P4-072012	P1203007-004	Air	7/20/2012	09:50	AC01040	-2.66	3.59	X
PZAA-P5-072012	P1203007-005	Air	7/20/2012	15:45	AC01096	-2.12	3.62	X
PZAA-P6-072012	P1203007-006	Air	7/20/2012	14:40	AC01808	-3.28	3.62	X
PZAA-P7-072012	P1203007-007	Air	7/20/2012	12:15	AC01104	-3.13	3.64	X
PZAA-P8-072012	P1203007-008	Air	7/20/2012	12:07	AC01016	-3.36	3.81	X
PZAA-C1-072012	P1203007-009	Air	7/20/2012	15:30	AC01645	-2.44	3.74	X
PZAA-C2-072012	P1203007-010	Air	7/20/2012	15:35	AC00915	-2.75	3.65	X
PZAA-C3-072012	P1203007-011	Air	7/20/2012	15:20	AC01881	-2.64	3.50	X
PZAA-C4-072012	P1203007-012	Air	7/20/2012	15:40	AC00929	-1.73	3.63	X
PZAA-C3-072012-D	P1203007-013	Air	7/20/2012	15:20	AC01783	-1.74	3.73	X

Sample Acceptance Check Form

Client: CH2M Hill

Work order: P1203007

Project: Pfizer Ambient Air Monitoring / 431248.AM.FW

Sample(s) received on: 7/24/12

Date opened: 7/24/12

by: MZAMORA

Note: This form is used for all samples received by CAS. The use of this form for custody seals is strictly meant to indicate presence/absence and not as an indication of compliance or nonconformity. Thermal preservation and pH will only be evaluated either at the request of the client and/or as required by the method/SOP.

Yes **No** **N/A**

- 1 Were **sample containers** properly marked with client sample ID?
- 2 Container(s) **supplied by CAS?**
- 3 Did **sample containers** arrive in good condition?
- 4 Were **chain-of-custody** papers used and filled out?
- 5 Did **sample container labels** and/or tags agree with custody papers?
- 6 Was **sample volume** received adequate for analysis?
- 7 Are samples within specified holding times?
- 8 Was proper **temperature** (thermal preservation) of cooler at receipt adhered to?

- 9 Was a **trip blank** received?
- 10 Were **custody seals** on outside of cooler/Box?

Location of seal(s)? _____	Sealing Lid? <input type="checkbox"/> <input checked="" type="checkbox"/> <input type="checkbox"/>
Were signature and date included?	<input type="checkbox"/> <input checked="" type="checkbox"/> <input type="checkbox"/>
Were seals intact?	<input type="checkbox"/> <input checked="" type="checkbox"/> <input type="checkbox"/>
Were custody seals on outside of sample container?	<input type="checkbox"/> <input checked="" type="checkbox"/> <input type="checkbox"/>

 Location of seal(s)? _____ Sealing Lid?
 Were signature and date included?
 Were seals intact?
 Were custody seals on outside of sample container?

- 11 Do containers have appropriate **preservation**, according to method/SOP or Client specified information?
 Is there a client indication that the submitted samples are **pH** preserved?
 Were **VOA vials** checked for presence/absence of air bubbles?
 Does the client/method/SOP require that the analyst check the sample pH and if necessary alter it?
- 12 **Tubes:** Are the tubes capped and intact?
 Do they contain moisture?
- 13 **Badges:** Are the badges properly capped and intact?
 Are dual bed badges separated and individually capped and intact?

Lab Sample ID	Container Description	Required pH *	Received pH	Adjusted pH	VOA Headspace (Presence/Absence)	Receipt / Preservation Comments
P1203007-001.01	6.0 L Ambient Can					
P1203007-002.01	6.0 L Ambient Can					
P1203007-003.01	6.0 L Ambient Can					
P1203007-004.01	6.0 L Ambient Can					
P1203007-005.01	6.0 L Ambient Can					
P1203007-006.01	6.0 L Ambient Can					
P1203007-007.01	6.0 L Ambient Can					
P1203007-008.01	6.0 L Ambient Can					

Explain any discrepancies: (include lab sample ID numbers): _____

RSK - MEEPP, HCL (pH<2); RSK - CO2, (pH 5-8); Sulfur (pH>4)

RESULTS OF ANALYSIS

Page 1 of 3

Client: CH2M Hill

Client Sample ID: PZAA-P1-072012

CAS Project ID: P1203007

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1203007-001

Test Code: EPA TO-15

Date Collected: 7/20/12

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9

Date Received: 7/24/12

Analyst: Wida Ang

Date Analyzed: 7/27/12

Sampling Media: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01243

Initial Pressure (psig): -2.08 Final Pressure (psig): 3.71

Canister Dilution Factor: 1.46

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	1.9	0.73	1.1	0.42	M1
75-71-8	Dichlorodifluoromethane (CFC 12)	2.3	0.73	0.47	0.15	
74-87-3	Chloromethane	0.40	0.29	0.20	0.14	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.73	ND	0.10	
75-01-4	Vinyl Chloride	ND	0.15	ND	0.057	
106-99-0	1,3-Butadiene	ND	0.29	ND	0.13	
74-83-9	Bromomethane	ND	0.15	ND	0.038	
75-00-3	Chloroethane	ND	0.15	ND	0.055	
64-17-5	Ethanol	20	7.3	10	3.9	
75-05-8	Acetonitrile	ND	0.73	ND	0.43	
107-02-8	Acrolein	ND	2.9	ND	1.3	
67-64-1	Acetone	19	7.3	8.0	3.1	
75-69-4	Trichlorofluoromethane	1.2	0.15	0.22	0.026	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	7.3	ND	3.0	
107-13-1	Acrylonitrile	ND	0.73	ND	0.34	
75-35-4	1,1-Dichloroethene	ND	0.15	ND	0.037	
75-09-2	Methylene Chloride	0.74	0.73	0.21	0.21	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.15	ND	0.047	
76-13-1	Trichlorotrifluoroethane	0.54	0.15	0.070	0.019	
75-15-0	Carbon Disulfide	ND	7.3	ND	2.3	
156-60-5	trans-1,2-Dichloroethene	ND	0.15	ND	0.037	
75-34-3	1,1-Dichloroethane	ND	0.15	ND	0.036	
1634-04-4	Methyl tert-Butyl Ether	ND	0.15	ND	0.041	
108-05-4	Vinyl Acetate	ND	7.3	ND	2.1	
78-93-3	2-Butanone (MEK)	ND	7.3	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

M1 = Matrix interference due to coelution with a non-target compound; results may be biased high.

RESULTS OF ANALYSIS

Page 2 of 3

Client: CH2M Hill

Client Sample ID: PZAA-P1-072012

CAS Project ID: P1203007

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1203007-001

Test Code: EPA TO-15

Date Collected: 7/20/12

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9

Date Received: 7/24/12

Analyst: Wida Ang

Date Analyzed: 7/27/12

Sampling Media: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01243

Initial Pressure (psig): -2.08 Final Pressure (psig): 3.71

Canister Dilution Factor: 1.46

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.15	ND	0.037	
141-78-6	Ethyl Acetate	2.6	1.5	0.73	0.41	
110-54-3	n-Hexane	0.78	0.73	0.22	0.21	
67-66-3	Chloroform	0.17	0.15	0.035	0.030	
109-99-9	Tetrahydrofuran (THF)	ND	0.73	ND	0.25	
107-06-2	1,2-Dichloroethane	ND	0.15	ND	0.036	
71-55-6	1,1,1-Trichloroethane	ND	0.15	ND	0.027	
71-43-2	Benzene	0.57	0.15	0.18	0.046	
56-23-5	Carbon Tetrachloride	0.53	0.15	0.084	0.023	
110-82-7	Cyclohexane	ND	1.5	ND	0.42	
78-87-5	1,2-Dichloropropane	ND	0.15	ND	0.032	
75-27-4	Bromodichloromethane	ND	0.15	ND	0.022	
79-01-6	Trichloroethene	0.18	0.15	0.034	0.027	
123-91-1	1,4-Dioxane	ND	0.73	ND	0.20	
80-62-6	Methyl Methacrylate	ND	1.5	ND	0.36	
142-82-5	n-Heptane	ND	0.73	ND	0.18	
10061-01-5	cis-1,3-Dichloropropene	ND	0.73	ND	0.16	
108-10-1	4-Methyl-2-pentanone	ND	0.73	ND	0.18	
10061-02-6	trans-1,3-Dichloropropene	ND	0.73	ND	0.16	
79-00-5	1,1,2-Trichloroethane	ND	0.15	ND	0.027	
108-88-3	Toluene	3.3	0.73	0.87	0.19	
591-78-6	2-Hexanone	0.88	0.73	0.22	0.18	
124-48-1	Dibromochloromethane	ND	0.15	ND	0.017	
106-93-4	1,2-Dibromoethane	ND	0.15	ND	0.019	
123-86-4	n-Butyl Acetate	0.92	0.73	0.19	0.15	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 3 of 3

Client: CH2M Hill
Client Sample ID: PZAA-P1-072012
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1203007
CAS Sample ID: P1203007-001

Test Code: EPA TO-15 Date Collected: 7/20/12
Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9 Date Received: 7/24/12
Analyst: Wida Ang Date Analyzed: 7/27/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC01243

Initial Pressure (psig): -2.08 Final Pressure (psig): 3.71

Canister Dilution Factor: 1.46

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.73	ND	0.16	
127-18-4	Tetrachloroethene	0.24	0.15	0.036	0.022	
108-90-7	Chlorobenzene	ND	0.15	ND	0.032	
100-41-4	Ethylbenzene	1.2	0.73	0.29	0.17	
179601-23-1	m,p-Xylenes	5.0	0.73	1.1	0.17	
75-25-2	Bromoform	ND	0.73	ND	0.071	
100-42-5	Styrene	ND	0.73	ND	0.17	
95-47-6	o-Xylene	0.86	0.73	0.20	0.17	
111-84-2	n-Nonane	ND	0.73	ND	0.14	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.15	ND	0.021	
98-82-8	Cumene	ND	0.73	ND	0.15	
80-56-8	alpha-Pinene	ND	0.73	ND	0.13	
103-65-1	n-Propylbenzene	ND	0.73	ND	0.15	
622-96-8	4-Ethyltoluene	ND	0.73	ND	0.15	
108-67-8	1,3,5-Trimethylbenzene	ND	0.73	ND	0.15	
95-63-6	1,2,4-Trimethylbenzene	1.0	0.73	0.21	0.15	
100-44-7	Benzyl Chloride	ND	0.73	ND	0.14	
541-73-1	1,3-Dichlorobenzene	ND	0.15	ND	0.024	
106-46-7	1,4-Dichlorobenzene	ND	0.15	ND	0.024	
95-50-1	1,2-Dichlorobenzene	ND	0.15	ND	0.024	
5989-27-5	d-Limonene	ND	0.73	ND	0.13	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.73	ND	0.076	
120-82-1	1,2,4-Trichlorobenzene	ND	0.73	ND	0.098	
91-20-3	Naphthalene	ND	0.73	ND	0.14	
87-68-3	Hexachlorobutadiene	ND	0.73	ND	0.068	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-P2-072012

CAS Project ID: P1203007

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1203007-002

Test Code: EPA TO-15

Date Collected: 7/20/12

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9

Date Received: 7/24/12

Analyst: Wida Ang

Date Analyzed: 7/27/12

Sampling Media: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01893

Initial Pressure (psig): -2.89 Final Pressure (psig): 3.52

Canister Dilution Factor: 1.54

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	2.0	0.77	1.2	0.45	M1
75-71-8	Dichlorodifluoromethane (CFC 12)	2.5	0.77	0.51	0.16	
74-87-3	Chloromethane	0.43	0.31	0.21	0.15	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.77	ND	0.11	
75-01-4	Vinyl Chloride	ND	0.15	ND	0.060	
106-99-0	1,3-Butadiene	ND	0.31	ND	0.14	
74-83-9	Bromomethane	ND	0.15	ND	0.040	
75-00-3	Chloroethane	ND	0.15	ND	0.058	
64-17-5	Ethanol	13	7.7	7.1	4.1	
75-05-8	Acetonitrile	ND	0.77	ND	0.46	
107-02-8	Acrolein	ND	3.1	ND	1.3	
67-64-1	Acetone	11	7.7	4.6	3.2	
75-69-4	Trichlorofluoromethane	1.3	0.15	0.23	0.027	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	7.7	ND	3.1	
107-13-1	Acrylonitrile	ND	0.77	ND	0.35	
75-35-4	1,1-Dichloroethene	ND	0.15	ND	0.039	
75-09-2	Methylene Chloride	0.91	0.77	0.26	0.22	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.15	ND	0.049	
76-13-1	Trichlorotrifluoroethane	0.52	0.15	0.068	0.020	
75-15-0	Carbon Disulfide	ND	7.7	ND	2.5	
156-60-5	trans-1,2-Dichloroethene	ND	0.15	ND	0.039	
75-34-3	1,1-Dichloroethane	ND	0.15	ND	0.038	
1634-04-4	Methyl tert-Butyl Ether	ND	0.15	ND	0.043	
108-05-4	Vinyl Acetate	ND	7.7	ND	2.2	
78-93-3	2-Butanone (MEK)	ND	7.7	ND	2.6	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

M1 = Matrix interference due to coelution with a non-target compound; results may be biased high.

RESULTS OF ANALYSIS

Page 2 of 3

Client: CH2M Hill

Client Sample ID: PZAA-P2-072012

CAS Project ID: P1203007

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1203007-002

Test Code: EPA TO-15

Date Collected: 7/20/12

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9

Date Received: 7/24/12

Analyst: Wida Ang

Date Analyzed: 7/27/12

Sampling Media: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:

Container ID: AC01893

Initial Pressure (psig): -2.89 Final Pressure (psig): 3.52

Canister Dilution Factor: 1.54

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.15	ND	0.039	
141-78-6	Ethyl Acetate	4.2	1.5	1.2	0.43	
110-54-3	n-Hexane	ND	0.77	ND	0.22	
67-66-3	Chloroform	0.27	0.15	0.055	0.032	
109-99-9	Tetrahydrofuran (THF)	ND	0.77	ND	0.26	
107-06-2	1,2-Dichloroethane	ND	0.15	ND	0.038	
71-55-6	1,1,1-Trichloroethane	ND	0.15	ND	0.028	
71-43-2	Benzene	0.55	0.15	0.17	0.048	
56-23-5	Carbon Tetrachloride	0.51	0.15	0.080	0.024	
110-82-7	Cyclohexane	ND	1.5	ND	0.45	
78-87-5	1,2-Dichloropropane	ND	0.15	ND	0.033	
75-27-4	Bromodichloromethane	ND	0.15	ND	0.023	
79-01-6	Trichloroethene	0.19	0.15	0.035	0.029	
123-91-1	1,4-Dioxane	ND	0.77	ND	0.21	
80-62-6	Methyl Methacrylate	ND	1.5	ND	0.38	
142-82-5	n-Heptane	ND	0.77	ND	0.19	
10061-01-5	cis-1,3-Dichloropropene	ND	0.77	ND	0.17	
108-10-1	4-Methyl-2-pentanone	ND	0.77	ND	0.19	
10061-02-6	trans-1,3-Dichloropropene	ND	0.77	ND	0.17	
79-00-5	1,1,2-Trichloroethane	ND	0.15	ND	0.028	
108-88-3	Toluene	3.0	0.77	0.79	0.20	
591-78-6	2-Hexanone	ND	0.77	ND	0.19	
124-48-1	Dibromochloromethane	ND	0.15	ND	0.018	
106-93-4	1,2-Dibromoethane	ND	0.15	ND	0.020	
123-86-4	n-Butyl Acetate	ND	0.77	ND	0.16	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P2-072012
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1203007
CAS Sample ID: P1203007-002

Test Code: EPA TO-15 Date Collected: 7/20/12
Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9 Date Received: 7/24/12
Analyst: Wida Ang Date Analyzed: 7/27/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC01893

Initial Pressure (psig): -2.89 Final Pressure (psig): 3.52

Canister Dilution Factor: 1.54

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.77	ND	0.16	
127-18-4	Tetrachloroethene	0.22	0.15	0.033	0.023	
108-90-7	Chlorobenzene	ND	0.15	ND	0.033	
100-41-4	Ethylbenzene	1.1	0.77	0.26	0.18	
179601-23-1	m,p-Xylenes	4.3	0.77	0.98	0.18	
75-25-2	Bromoform	ND	0.77	ND	0.075	
100-42-5	Styrene	ND	0.77	ND	0.18	
95-47-6	o-Xylene	0.77	0.77	0.18	0.18	
111-84-2	n-Nonane	ND	0.77	ND	0.15	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.15	ND	0.022	
98-82-8	Cumene	ND	0.77	ND	0.16	
80-56-8	alpha-Pinene	ND	0.77	ND	0.14	
103-65-1	n-Propylbenzene	ND	0.77	ND	0.16	
622-96-8	4-Ethyltoluene	ND	0.77	ND	0.16	
108-67-8	1,3,5-Trimethylbenzene	ND	0.77	ND	0.16	
95-63-6	1,2,4-Trimethylbenzene	0.86	0.77	0.17	0.16	
100-44-7	Benzyl Chloride	ND	0.77	ND	0.15	
541-73-1	1,3-Dichlorobenzene	ND	0.15	ND	0.026	
106-46-7	1,4-Dichlorobenzene	ND	0.15	ND	0.026	
95-50-1	1,2-Dichlorobenzene	ND	0.15	ND	0.026	
5989-27-5	d-Limonene	ND	0.77	ND	0.14	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.77	ND	0.080	
120-82-1	1,2,4-Trichlorobenzene	ND	0.77	ND	0.10	
91-20-3	Naphthalene	ND	0.77	ND	0.15	
87-68-3	Hexachlorobutadiene	ND	0.77	ND	0.072	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 1 of 3

Client: CH2M Hill

Client Sample ID: PZAA-P3-072012

CAS Project ID: P1203007

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1203007-003

Test Code: EPA TO-15

Date Collected: 7/20/12

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9

Date Received: 7/24/12

Analyst: Wida Ang

Date Analyzed: 7/27/12

Sampling Media: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01462

Initial Pressure (psig): -2.50 Final Pressure (psig): 3.65

Canister Dilution Factor: 1.50

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	21	0.75	12	0.44	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.2	0.75	0.45	0.15	
74-87-3	Chloromethane	0.39	0.30	0.19	0.15	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.75	ND	0.11	
75-01-4	Vinyl Chloride	ND	0.15	ND	0.059	
106-99-0	1,3-Butadiene	ND	0.30	ND	0.14	
74-83-9	Bromomethane	ND	0.15	ND	0.039	
75-00-3	Chloroethane	ND	0.15	ND	0.057	
64-17-5	Ethanol	470	7.5	250	4.0	
75-05-8	Acetonitrile	0.84	0.75	0.50	0.45	
107-02-8	Acrolein	ND	3.0	ND	1.3	
67-64-1	Acetone	29	7.5	12	3.2	
75-69-4	Trichlorofluoromethane	1.2	0.15	0.22	0.027	
67-63-0	2-Propanol (Isopropyl Alcohol)	82	7.5	33	3.1	
107-13-1	Acrylonitrile	ND	0.75	ND	0.35	
75-35-4	1,1-Dichloroethene	ND	0.15	ND	0.038	
75-09-2	Methylene Chloride	1.3	0.75	0.37	0.22	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.15	ND	0.048	
76-13-1	Trichlorotrifluoroethane	0.54	0.15	0.070	0.020	
75-15-0	Carbon Disulfide	ND	7.5	ND	2.4	
156-60-5	trans-1,2-Dichloroethene	ND	0.15	ND	0.038	
75-34-3	1,1-Dichloroethane	ND	0.15	ND	0.037	
1634-04-4	Methyl tert-Butyl Ether	ND	0.15	ND	0.042	
108-05-4	Vinyl Acetate	ND	7.5	ND	2.1	
78-93-3	2-Butanone (MEK)	12	7.5	4.2	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 2 of 3

Client: CH2M Hill

Client Sample ID: PZAA-P3-072012

CAS Project ID: P1203007

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1203007-003

Test Code: EPA TO-15

Date Collected: 7/20/12

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9

Date Received: 7/24/12

Analyst: Wida Ang

Date Analyzed: 7/27/12

Sampling Media: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01462

Initial Pressure (psig): -2.50 **Final Pressure (psig):** 3.65

Canister Dilution Factor: 1.50

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.15	ND	0.038	
141-78-6	Ethyl Acetate	37	1.5	10	0.42	
110-54-3	n-Hexane	0.90	0.75	0.26	0.21	
67-66-3	Chloroform	0.18	0.15	0.036	0.031	
109-99-9	Tetrahydrofuran (THF)	ND	0.75	ND	0.25	
107-06-2	1,2-Dichloroethane	ND	0.15	ND	0.037	
71-55-6	1,1,1-Trichloroethane	ND	0.15	ND	0.028	
71-43-2	Benzene	1.0	0.15	0.33	0.047	
56-23-5	Carbon Tetrachloride	0.62	0.15	0.099	0.024	
110-82-7	Cyclohexane	ND	1.5	ND	0.44	
78-87-5	1,2-Dichloropropane	ND	0.15	ND	0.032	
75-27-4	Bromodichloromethane	ND	0.15	ND	0.022	
79-01-6	Trichloroethene	0.24	0.15	0.045	0.028	
123-91-1	1,4-Dioxane	ND	0.75	ND	0.21	
80-62-6	Methyl Methacrylate	ND	1.5	ND	0.37	
142-82-5	n-Heptane	ND	0.75	ND	0.18	
10061-01-5	cis-1,3-Dichloropropene	ND	0.75	ND	0.17	
108-10-1	4-Methyl-2-pentanone	2.5	0.75	0.60	0.18	
10061-02-6	trans-1,3-Dichloropropene	ND	0.75	ND	0.17	
79-00-5	1,1,2-Trichloroethane	ND	0.15	ND	0.028	
108-88-3	Toluene	4.3	0.75	1.1	0.20	
591-78-6	2-Hexanone	12	0.75	2.8	0.18	
124-48-1	Dibromochloromethane	ND	0.15	ND	0.018	
106-93-4	1,2-Dibromoethane	ND	0.15	ND	0.020	
123-86-4	n-Butyl Acetate	0.76	0.75	0.16	0.16	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P3-072012
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1203007
CAS Sample ID: P1203007-003

Test Code: EPA TO-15 Date Collected: 7/20/12
Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9 Date Received: 7/24/12
Analyst: Wida Ang Date Analyzed: 7/27/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC01462

Initial Pressure (psig): -2.50 Final Pressure (psig): 3.65

Canister Dilution Factor: 1.50

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.75	ND	0.16	
127-18-4	Tetrachloroethene	0.19	0.15	0.028	0.022	
108-90-7	Chlorobenzene	ND	0.15	ND	0.033	
100-41-4	Ethylbenzene	1.6	0.75	0.36	0.17	
179601-23-1	m,p-Xylenes	5.7	0.75	1.3	0.17	
75-25-2	Bromoform	ND	0.75	ND	0.073	
100-42-5	Styrene	ND	0.75	ND	0.18	
95-47-6	o-Xylene	0.99	0.75	0.23	0.17	
111-84-2	n-Nonane	ND	0.75	ND	0.14	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.15	ND	0.022	
98-82-8	Cumene	ND	0.75	ND	0.15	
80-56-8	alpha-Pinene	ND	0.75	ND	0.13	
103-65-1	n-Propylbenzene	ND	0.75	ND	0.15	
622-96-8	4-Ethyltoluene	ND	0.75	ND	0.15	
108-67-8	1,3,5-Trimethylbenzene	ND	0.75	ND	0.15	
95-63-6	1,2,4-Trimethylbenzene	1.2	0.75	0.24	0.15	
100-44-7	Benzyl Chloride	ND	0.75	ND	0.14	
541-73-1	1,3-Dichlorobenzene	ND	0.15	ND	0.025	
106-46-7	1,4-Dichlorobenzene	ND	0.15	ND	0.025	
95-50-1	1,2-Dichlorobenzene	ND	0.15	ND	0.025	
5989-27-5	d-Limonene	ND	0.75	ND	0.13	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.75	ND	0.078	
120-82-1	1,2,4-Trichlorobenzene	ND	0.75	ND	0.10	
91-20-3	Naphthalene	ND	0.75	ND	0.14	
87-68-3	Hexachlorobutadiene	ND	0.75	ND	0.070	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-P4-072012

CAS Project ID: P1203007

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1203007-004

Test Code: EPA TO-15

Date Collected: 7/20/12

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9

Date Received: 7/24/12

Analyst: Wida Ang

Date Analyzed: 7/27/12

Sampling Media: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01040

Initial Pressure (psig): -2.66 Final Pressure (psig): 3.59

Canister Dilution Factor: 1.52

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	1.8	0.76	1.0	0.44	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.3	0.76	0.47	0.15	
74-87-3	Chloromethane	0.59	0.30	0.29	0.15	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.76	ND	0.11	
75-01-4	Vinyl Chloride	ND	0.15	ND	0.059	
106-99-0	1,3-Butadiene	ND	0.30	ND	0.14	
74-83-9	Bromomethane	ND	0.15	ND	0.039	
75-00-3	Chloroethane	ND	0.15	ND	0.058	
64-17-5	Ethanol	46	7.6	24	4.0	
75-05-8	Acetonitrile	ND	0.76	ND	0.45	
107-02-8	Acrolein	5.9	3.0	2.6	1.3	
67-64-1	Acetone	130	7.6	53	3.2	
75-69-4	Trichlorofluoromethane	1.2	0.15	0.21	0.027	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	7.6	ND	3.1	
107-13-1	Acrylonitrile	ND	0.76	ND	0.35	
75-35-4	1,1-Dichloroethene	ND	0.15	ND	0.038	
75-09-2	Methylene Chloride	1.7	0.76	0.49	0.22	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.15	ND	0.049	
76-13-1	Trichlorotrifluoroethane	0.54	0.15	0.070	0.020	
75-15-0	Carbon Disulfide	ND	7.6	ND	2.4	
156-60-5	trans-1,2-Dichloroethene	ND	0.15	ND	0.038	
75-34-3	1,1-Dichloroethane	ND	0.15	ND	0.038	
1634-04-4	Methyl tert-Butyl Ether	ND	0.15	ND	0.042	
108-05-4	Vinyl Acetate	ND	7.6	ND	2.2	
78-93-3	2-Butanone (MEK)	8.2	7.6	2.8	2.6	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-P4-072012

CAS Project ID: P1203007

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1203007-004

Test Code: EPA TO-15

Date Collected: 7/20/12

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9

Date Received: 7/24/12

Analyst: Wida Ang

Date Analyzed: 7/27/12

Sampling Media: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01040

Initial Pressure (psig): -2.66 Final Pressure (psig): 3.59

Canister Dilution Factor: 1.52

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.15	ND	0.038	
141-78-6	Ethyl Acetate	3.0	1.5	0.83	0.42	
110-54-3	n-Hexane	1.6	0.76	0.44	0.22	
67-66-3	Chloroform	0.18	0.15	0.038	0.031	
109-99-9	Tetrahydrofuran (THF)	ND	0.76	ND	0.26	
107-06-2	1,2-Dichloroethane	ND	0.15	ND	0.038	
71-55-6	1,1,1-Trichloroethane	ND	0.15	ND	0.028	
71-43-2	Benzene	0.84	0.15	0.26	0.048	
56-23-5	Carbon Tetrachloride	0.46	0.15	0.073	0.024	
110-82-7	Cyclohexane	3.5	1.5	1.0	0.44	
78-87-5	1,2-Dichloropropane	ND	0.15	ND	0.033	
75-27-4	Bromodichloromethane	ND	0.15	ND	0.023	
79-01-6	Trichloroethene	ND	0.15	ND	0.028	
123-91-1	1,4-Dioxane	ND	0.76	ND	0.21	
80-62-6	Methyl Methacrylate	ND	1.5	ND	0.37	
142-82-5	n-Heptane	1.3	0.76	0.32	0.19	
10061-01-5	cis-1,3-Dichloropropene	ND	0.76	ND	0.17	
108-10-1	4-Methyl-2-pentanone	ND	0.76	ND	0.19	
10061-02-6	trans-1,3-Dichloropropene	ND	0.76	ND	0.17	
79-00-5	1,1,2-Trichloroethane	ND	0.15	ND	0.028	
108-88-3	Toluene	4.6	0.76	1.2	0.20	
591-78-6	2-Hexanone	ND	0.76	ND	0.19	
124-48-1	Dibromochloromethane	ND	0.15	ND	0.018	
106-93-4	1,2-Dibromoethane	ND	0.15	ND	0.020	
123-86-4	n-Butyl Acetate	ND	0.76	ND	0.16	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 3 of 3

Client: CH2M Hill
Client Sample ID: PZAA-P4-072012
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1203007
CAS Sample ID: P1203007-004

Test Code: EPA TO-15 Date Collected: 7/20/12
Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9 Date Received: 7/24/12
Analyst: Wida Ang Date Analyzed: 7/27/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC01040

Initial Pressure (psig): -2.66 Final Pressure (psig): 3.59

Canister Dilution Factor: 1.52

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	4.5	0.76	0.96	0.16	
127-18-4	Tetrachloroethene	0.18	0.15	0.026	0.022	
108-90-7	Chlorobenzene	ND	0.15	ND	0.033	
100-41-4	Ethylbenzene	0.83	0.76	0.19	0.18	
179601-23-1	m,p-Xylenes	2.2	0.76	0.50	0.18	
75-25-2	Bromoform	ND	0.76	ND	0.074	
100-42-5	Styrene	1.1	0.76	0.26	0.18	
95-47-6	o-Xylene	1.0	0.76	0.24	0.18	
111-84-2	n-Nonane	1.2	0.76	0.23	0.14	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.15	ND	0.022	
98-82-8	Cumene	ND	0.76	ND	0.15	
80-56-8	alpha-Pinene	13	0.76	2.3	0.14	
103-65-1	n-Propylbenzene	ND	0.76	ND	0.15	
622-96-8	4-Ethyltoluene	ND	0.76	ND	0.15	
108-67-8	1,3,5-Trimethylbenzene	ND	0.76	ND	0.15	
95-63-6	1,2,4-Trimethylbenzene	1.3	0.76	0.26	0.15	
100-44-7	Benzyl Chloride	ND	0.76	ND	0.15	
541-73-1	1,3-Dichlorobenzene	0.62	0.15	0.10	0.025	
106-46-7	1,4-Dichlorobenzene	ND	0.15	ND	0.025	
95-50-1	1,2-Dichlorobenzene	ND	0.15	ND	0.025	
5989-27-5	d-Limonene	2.6	0.76	0.47	0.14	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.76	ND	0.079	
120-82-1	1,2,4-Trichlorobenzene	ND	0.76	ND	0.10	
91-20-3	Naphthalene	ND	0.76	ND	0.15	
87-68-3	Hexachlorobutadiene	ND	0.76	ND	0.071	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 1 of 3

Client: CH2M Hill

Client Sample ID: PZAA-P5-072012

CAS Project ID: P1203007

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1203007-005

Test Code: EPA TO-15

Date Collected: 7/20/12

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9

Date Received: 7/24/12

Analyst: Wida Ang

Date Analyzed: 7/27/12

Sampling Media: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01096

Initial Pressure (psig): -2.12 Final Pressure (psig): 3.62

Canister Dilution Factor: 1.46

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	2.3	0.73	1.3	0.42	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.3	0.73	0.46	0.15	
74-87-3	Chloromethane	1.1	0.29	0.51	0.14	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.73	ND	0.10	
75-01-4	Vinyl Chloride	ND	0.15	ND	0.057	
106-99-0	1,3-Butadiene	0.34	0.29	0.15	0.13	
74-83-9	Bromomethane	ND	0.15	ND	0.038	
75-00-3	Chloroethane	ND	0.15	ND	0.055	
64-17-5	Ethanol	45	7.3	24	3.9	
75-05-8	Acetonitrile	ND	0.73	ND	0.43	
107-02-8	Acrolein	18	2.9	7.7	1.3	
67-64-1	Acetone	350	7.3	150	3.1	
75-69-4	Trichlorofluoromethane	1.2	0.15	0.22	0.026	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	7.3	ND	3.0	
107-13-1	Acrylonitrile	ND	0.73	ND	0.34	
75-35-4	1,1-Dichloroethene	ND	0.15	ND	0.037	
75-09-2	Methylene Chloride	1.1	0.73	0.32	0.21	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.15	ND	0.047	
76-13-1	Trichlorotrifluoroethane	0.51	0.15	0.067	0.019	
75-15-0	Carbon Disulfide	ND	7.3	ND	2.3	
156-60-5	trans-1,2-Dichloroethene	ND	0.15	ND	0.037	
75-34-3	1,1-Dichloroethane	ND	0.15	ND	0.036	
1634-04-4	Methyl tert-Butyl Ether	ND	0.15	ND	0.041	
108-05-4	Vinyl Acetate	13	7.3	3.8	2.1	
78-93-3	2-Butanone (MEK)	9.7	7.3	3.3	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-P5-072012

CAS Project ID: P1203007

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1203007-005

Test Code: EPA TO-15

Date Collected: 7/20/12

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9

Date Received: 7/24/12

Analyst: Wida Ang

Date Analyzed: 7/27/12

Sampling Media: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01096

Initial Pressure (psig): -2.12 Final Pressure (psig): 3.62

Canister Dilution Factor: 1.46

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.15	ND	0.037	
141-78-6	Ethyl Acetate	4.1	1.5	1.1	0.41	
110-54-3	n-Hexane	1.3	0.73	0.38	0.21	
67-66-3	Chloroform	0.19	0.15	0.039	0.030	
109-99-9	Tetrahydrofuran (THF)	ND	0.73	ND	0.25	
107-06-2	1,2-Dichloroethane	ND	0.15	ND	0.036	
71-55-6	1,1,1-Trichloroethane	ND	0.15	ND	0.027	
71-43-2	Benzene	0.90	0.15	0.28	0.046	
56-23-5	Carbon Tetrachloride	0.45	0.15	0.072	0.023	
110-82-7	Cyclohexane	2.8	1.5	0.82	0.42	
78-87-5	1,2-Dichloropropane	ND	0.15	ND	0.032	
75-27-4	Bromodichloromethane	ND	0.15	ND	0.022	
79-01-6	Trichloroethene	ND	0.15	ND	0.027	
123-91-1	1,4-Dioxane	ND	0.73	ND	0.20	
80-62-6	Methyl Methacrylate	ND	1.5	ND	0.36	
142-82-5	n-Heptane	1.1	0.73	0.28	0.18	
10061-01-5	cis-1,3-Dichloropropene	ND	0.73	ND	0.16	
108-10-1	4-Methyl-2-pentanone	ND	0.73	ND	0.18	
10061-02-6	trans-1,3-Dichloropropene	ND	0.73	ND	0.16	
79-00-5	1,1,2-Trichloroethane	ND	0.15	ND	0.027	
108-88-3	Toluene	4.6	0.73	1.2	0.19	
591-78-6	2-Hexanone	ND	0.73	ND	0.18	
124-48-1	Dibromochloromethane	ND	0.15	ND	0.017	
106-93-4	1,2-Dibromoethane	ND	0.15	ND	0.019	
123-86-4	n-Butyl Acetate	ND	0.73	ND	0.15	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P5-072012
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1203007
CAS Sample ID: P1203007-005

Test Code: EPA TO-15 Date Collected: 7/20/12
Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9 Date Received: 7/24/12
Analyst: Wida Ang Date Analyzed: 7/27/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC01096

Initial Pressure (psig): -2.12 Final Pressure (psig): 3.62

Canister Dilution Factor: 1.46

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	4.5	0.73	0.96	0.16	
127-18-4	Tetrachloroethene	0.16	0.15	0.024	0.022	
108-90-7	Chlorobenzene	ND	0.15	ND	0.032	
100-41-4	Ethylbenzene	0.79	0.73	0.18	0.17	
179601-23-1	m,p-Xylenes	1.9	0.73	0.45	0.17	
75-25-2	Bromoform	ND	0.73	ND	0.071	
100-42-5	Styrene	1.0	0.73	0.24	0.17	
95-47-6	o-Xylene	0.92	0.73	0.21	0.17	
111-84-2	n-Nonane	1.1	0.73	0.21	0.14	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.15	ND	0.021	
98-82-8	Cumene	ND	0.73	ND	0.15	
80-56-8	alpha-Pinene	11	0.73	2.0	0.13	
103-65-1	n-Propylbenzene	ND	0.73	ND	0.15	
622-96-8	4-Ethyltoluene	ND	0.73	ND	0.15	
108-67-8	1,3,5-Trimethylbenzene	ND	0.73	ND	0.15	
95-63-6	1,2,4-Trimethylbenzene	1.1	0.73	0.23	0.15	
100-44-7	Benzyl Chloride	ND	0.73	ND	0.14	
541-73-1	1,3-Dichlorobenzene	0.79	0.15	0.13	0.024	
106-46-7	1,4-Dichlorobenzene	ND	0.15	ND	0.024	
95-50-1	1,2-Dichlorobenzene	ND	0.15	ND	0.024	
5989-27-5	d-Limonene	2.2	0.73	0.40	0.13	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.73	ND	0.076	
120-82-1	1,2,4-Trichlorobenzene	ND	0.73	ND	0.098	
91-20-3	Naphthalene	ND	0.73	ND	0.14	
87-68-3	Hexachlorobutadiene	ND	0.73	ND	0.068	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 1 of 3

Client: CH2M Hill

Client Sample ID: PZAA-P6-072012

CAS Project ID: P1203007

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1203007-006

Test Code: EPA TO-15

Date Collected: 7/20/12

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9

Date Received: 7/24/12

Analyst: Wida Ang

Date Analyzed: 7/27/12

Sampling Media: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01808

Initial Pressure (psig): -3.28 Final Pressure (psig): 3.62

Canister Dilution Factor: 1.60

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	3.3	0.80	1.9	0.47	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.1	0.80	0.42	0.16	
74-87-3	Chloromethane	1.7	0.32	0.81	0.16	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.80	ND	0.11	
75-01-4	Vinyl Chloride	0.17	0.16	0.066	0.063	
106-99-0	1,3-Butadiene	0.71	0.32	0.32	0.14	
74-83-9	Bromomethane	0.22	0.16	0.056	0.041	
75-00-3	Chloroethane	0.28	0.16	0.11	0.061	
64-17-5	Ethanol	72	8.0	38	4.2	
75-05-8	Acetonitrile	ND	0.80	ND	0.48	
107-02-8	Acrolein	33	3.2	14	1.4	
67-64-1	Acetone	600	8.0	250	3.4	
75-69-4	Trichlorofluoromethane	1.2	0.16	0.21	0.028	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	8.0	ND	3.3	
107-13-1	Acrylonitrile	ND	0.80	ND	0.37	
75-35-4	1,1-Dichloroethene	ND	0.16	ND	0.040	
75-09-2	Methylene Chloride	1.2	0.80	0.33	0.23	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.16	ND	0.051	
76-13-1	Trichlorotrifluoroethane	0.51	0.16	0.067	0.021	
75-15-0	Carbon Disulfide	ND	8.0	ND	2.6	
156-60-5	trans-1,2-Dichloroethene	ND	0.16	ND	0.040	
75-34-3	1,1-Dichloroethane	ND	0.16	ND	0.040	
1634-04-4	Methyl tert-Butyl Ether	ND	0.16	ND	0.044	
108-05-4	Vinyl Acetate	17	8.0	4.8	2.3	
78-93-3	2-Butanone (MEK)	16	8.0	5.5	2.7	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-P6-072012

CAS Project ID: P1203007

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1203007-006

Test Code: EPA TO-15

Date Collected: 7/20/12

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9

Date Received: 7/24/12

Analyst: Wida Ang

Date Analyzed: 7/27/12

Sampling Media: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:

Container ID: AC01808

Initial Pressure (psig): -3.28 Final Pressure (psig): 3.62

Canister Dilution Factor: 1.60

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.16	ND	0.040	
141-78-6	Ethyl Acetate	4.7	1.6	1.3	0.44	
110-54-3	n-Hexane	1.6	0.80	0.45	0.23	
67-66-3	Chloroform	0.23	0.16	0.047	0.033	
109-99-9	Tetrahydrofuran (THF)	0.91	0.80	0.31	0.27	
107-06-2	1,2-Dichloroethane	ND	0.16	ND	0.040	
71-55-6	1,1,1-Trichloroethane	ND	0.16	ND	0.029	
71-43-2	Benzene	1.6	0.16	0.50	0.050	
56-23-5	Carbon Tetrachloride	0.48	0.16	0.077	0.025	
110-82-7	Cyclohexane	2.7	1.6	0.79	0.47	
78-87-5	1,2-Dichloropropane	0.17	0.16	0.037	0.035	
75-27-4	Bromodichloromethane	ND	0.16	ND	0.024	
79-01-6	Trichloroethene	ND	0.16	ND	0.030	
123-91-1	1,4-Dioxane	ND	0.80	ND	0.22	
80-62-6	Methyl Methacrylate	ND	1.6	ND	0.39	
142-82-5	n-Heptane	1.5	0.80	0.36	0.20	
10061-01-5	cis-1,3-Dichloropropene	ND	0.80	ND	0.18	
108-10-1	4-Methyl-2-pentanone	ND	0.80	ND	0.20	
10061-02-6	trans-1,3-Dichloropropene	ND	0.80	ND	0.18	
79-00-5	1,1,2-Trichloroethane	ND	0.16	ND	0.029	
108-88-3	Toluene	5.1	0.80	1.3	0.21	
591-78-6	2-Hexanone	ND	0.80	ND	0.20	
124-48-1	Dibromochloromethane	ND	0.16	ND	0.019	
106-93-4	1,2-Dibromoethane	ND	0.16	ND	0.021	
123-86-4	n-Butyl Acetate	ND	0.80	ND	0.17	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P6-072012
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1203007
CAS Sample ID: P1203007-006

Test Code: EPA TO-15 Date Collected: 7/20/12
Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9 Date Received: 7/24/12
Analyst: Wida Ang Date Analyzed: 7/27/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC01808

Initial Pressure (psig): -3.28 Final Pressure (psig): 3.62

Canister Dilution Factor: 1.60

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	5.4	0.80	1.2	0.17	
127-18-4	Tetrachloroethene	ND	0.16	ND	0.024	
108-90-7	Chlorobenzene	ND	0.16	ND	0.035	
100-41-4	Ethylbenzene	0.84	0.80	0.19	0.18	
179601-23-1	m,p-Xylenes	2.2	0.80	0.51	0.18	
75-25-2	Bromoform	ND	0.80	ND	0.077	
100-42-5	Styrene	1.2	0.80	0.27	0.19	
95-47-6	o-Xylene	1.1	0.80	0.25	0.18	
111-84-2	n-Nonane	1.3	0.80	0.24	0.15	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.16	ND	0.023	
98-82-8	Cumene	ND	0.80	ND	0.16	
80-56-8	alpha-Pinene	14	0.80	2.5	0.14	
103-65-1	n-Propylbenzene	ND	0.80	ND	0.16	
622-96-8	4-Ethyltoluene	ND	0.80	ND	0.16	
108-67-8	1,3,5-Trimethylbenzene	ND	0.80	ND	0.16	
95-63-6	1,2,4-Trimethylbenzene	1.3	0.80	0.27	0.16	
100-44-7	Benzyl Chloride	ND	0.80	ND	0.15	
541-73-1	1,3-Dichlorobenzene	0.52	0.16	0.087	0.027	
106-46-7	1,4-Dichlorobenzene	ND	0.16	ND	0.027	
95-50-1	1,2-Dichlorobenzene	ND	0.16	ND	0.027	
5989-27-5	d-Limonene	2.4	0.80	0.43	0.14	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.80	ND	0.083	
120-82-1	1,2,4-Trichlorobenzene	ND	0.80	ND	0.11	
91-20-3	Naphthalene	ND	0.80	ND	0.15	
87-68-3	Hexachlorobutadiene	ND	0.80	ND	0.075	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-P7-072012

CAS Project ID: P1203007

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1203007-007

Test Code: EPA TO-15

Date Collected: 7/20/12

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9

Date Received: 7/24/12

Analyst: Wida Ang

Date Analyzed: 7/27/12

Sampling Media: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01104

Initial Pressure (psig): -3.13 Final Pressure (psig): 3.64

Canister Dilution Factor: 1.59

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	1.4	0.80	0.80	0.46	M1
75-71-8	Dichlorodifluoromethane (CFC 12)	2.3	0.80	0.47	0.16	
74-87-3	Chloromethane	0.40	0.32	0.19	0.15	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.80	ND	0.11	
75-01-4	Vinyl Chloride	ND	0.16	ND	0.062	
106-99-0	1,3-Butadiene	ND	0.32	ND	0.14	
74-83-9	Bromomethane	ND	0.16	ND	0.041	
75-00-3	Chloroethane	ND	0.16	ND	0.060	
64-17-5	Ethanol	11	8.0	5.9	4.2	
75-05-8	Acetonitrile	ND	0.80	ND	0.47	
107-02-8	Acrolein	ND	3.2	ND	1.4	
67-64-1	Acetone	17	8.0	7.0	3.3	
75-69-4	Trichlorofluoromethane	1.3	0.16	0.23	0.028	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	8.0	ND	3.2	
107-13-1	Acrylonitrile	ND	0.80	ND	0.37	
75-35-4	1,1-Dichloroethene	ND	0.16	ND	0.040	
75-09-2	Methylene Chloride	0.89	0.80	0.26	0.23	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.16	ND	0.051	
76-13-1	Trichlorotrifluoroethane	0.58	0.16	0.076	0.021	
75-15-0	Carbon Disulfide	ND	8.0	ND	2.6	
156-60-5	trans-1,2-Dichloroethene	ND	0.16	ND	0.040	
75-34-3	1,1-Dichloroethane	ND	0.16	ND	0.039	
1634-04-4	Methyl tert-Butyl Ether	ND	0.16	ND	0.044	
108-05-4	Vinyl Acetate	ND	8.0	ND	2.3	
78-93-3	2-Butanone (MEK)	ND	8.0	ND	2.7	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

M1 = Matrix interference due to coelution with a non-target compound; results may be biased high.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-P7-072012

CAS Project ID: P1203007

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1203007-007

Test Code: EPA TO-15

Date Collected: 7/20/12

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9

Date Received: 7/24/12

Analyst: Wida Ang

Date Analyzed: 7/27/12

Sampling Media: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01104

Initial Pressure (psig): -3.13 Final Pressure (psig): 3.64

Canister Dilution Factor: 1.59

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.16	ND	0.040	
141-78-6	Ethyl Acetate	5.2	1.6	1.5	0.44	
110-54-3	n-Hexane	ND	0.80	ND	0.23	
67-66-3	Chloroform	0.17	0.16	0.035	0.033	
109-99-9	Tetrahydrofuran (THF)	ND	0.80	ND	0.27	
107-06-2	1,2-Dichloroethane	ND	0.16	ND	0.039	
71-55-6	1,1,1-Trichloroethane	ND	0.16	ND	0.029	
71-43-2	Benzene	0.60	0.16	0.19	0.050	
56-23-5	Carbon Tetrachloride	0.45	0.16	0.071	0.025	
110-82-7	Cyclohexane	ND	1.6	ND	0.46	
78-87-5	1,2-Dichloropropane	ND	0.16	ND	0.034	
75-27-4	Bromodichloromethane	ND	0.16	ND	0.024	
79-01-6	Trichloroethene	ND	0.16	ND	0.030	
123-91-1	1,4-Dioxane	ND	0.80	ND	0.22	
80-62-6	Methyl Methacrylate	ND	1.6	ND	0.39	
142-82-5	n-Heptane	ND	0.80	ND	0.19	
10061-01-5	cis-1,3-Dichloropropene	ND	0.80	ND	0.18	
108-10-1	4-Methyl-2-pentanone	ND	0.80	ND	0.19	
10061-02-6	trans-1,3-Dichloropropene	ND	0.80	ND	0.18	
79-00-5	1,1,2-Trichloroethane	ND	0.16	ND	0.029	
108-88-3	Toluene	2.1	0.80	0.56	0.21	
591-78-6	2-Hexanone	ND	0.80	ND	0.19	
124-48-1	Dibromochloromethane	ND	0.16	ND	0.019	
106-93-4	1,2-Dibromoethane	ND	0.16	ND	0.021	
123-86-4	n-Butyl Acetate	ND	0.80	ND	0.17	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P7-072012
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1203007
CAS Sample ID: P1203007-007

Test Code: EPA TO-15 Date Collected: 7/20/12
 Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9 Date Received: 7/24/12
 Analyst: Wida Ang Date Analyzed: 7/27/12
 Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
 Test Notes:
 Container ID: AC01104

Initial Pressure (psig): -3.13 Final Pressure (psig): 3.64

Canister Dilution Factor: 1.59

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.80	ND	0.17	
127-18-4	Tetrachloroethene	0.18	0.16	0.027	0.023	
108-90-7	Chlorobenzene	ND	0.16	ND	0.035	
100-41-4	Ethylbenzene	ND	0.80	ND	0.18	
179601-23-1	m,p-Xylenes	1.7	0.80	0.40	0.18	
75-25-2	Bromoform	ND	0.80	ND	0.077	
100-42-5	Styrene	ND	0.80	ND	0.19	
95-47-6	o-Xylene	ND	0.80	ND	0.18	
111-84-2	n-Nonane	ND	0.80	ND	0.15	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.16	ND	0.023	
98-82-8	Cumene	ND	0.80	ND	0.16	
80-56-8	alpha-Pinene	ND	0.80	ND	0.14	
103-65-1	n-Propylbenzene	ND	0.80	ND	0.16	
622-96-8	4-Ethyltoluene	ND	0.80	ND	0.16	
108-67-8	1,3,5-Trimethylbenzene	ND	0.80	ND	0.16	
95-63-6	1,2,4-Trimethylbenzene	ND	0.80	ND	0.16	
100-44-7	Benzyl Chloride	ND	0.80	ND	0.15	
541-73-1	1,3-Dichlorobenzene	ND	0.16	ND	0.026	
106-46-7	1,4-Dichlorobenzene	ND	0.16	ND	0.026	
95-50-1	1,2-Dichlorobenzene	ND	0.16	ND	0.026	
5989-27-5	d-Limonene	ND	0.80	ND	0.14	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.80	ND	0.082	
120-82-1	1,2,4-Trichlorobenzene	ND	0.80	ND	0.11	
91-20-3	Naphthalene	ND	0.80	ND	0.15	
87-68-3	Hexachlorobutadiene	ND	0.80	ND	0.075	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 1 of 3

Client: CH2M Hill

Client Sample ID: PZAA-P8-072012

CAS Project ID: P1203007

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1203007-008

Test Code: EPA TO-15

Date Collected: 7/20/12

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9

Date Received: 7/24/12

Analyst: Wida Ang

Date Analyzed: 7/27/12

Sampling Media: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01016

Initial Pressure (psig): -3.36 Final Pressure (psig): 3.81

Canister Dilution Factor: 1.63

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	1.5	0.82	0.87	0.47	M1
75-71-8	Dichlorodifluoromethane (CFC 12)	2.5	0.82	0.50	0.16	
74-87-3	Chloromethane	0.44	0.33	0.21	0.16	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.82	ND	0.12	
75-01-4	Vinyl Chloride	ND	0.16	ND	0.064	
106-99-0	1,3-Butadiene	ND	0.33	ND	0.15	
74-83-9	Bromomethane	ND	0.16	ND	0.042	
75-00-3	Chloroethane	ND	0.16	ND	0.062	
64-17-5	Ethanol	13	8.2	6.8	4.3	
75-05-8	Acetonitrile	ND	0.82	ND	0.49	
107-02-8	Acrolein	ND	3.3	ND	1.4	
67-64-1	Acetone	15	8.2	6.2	3.4	
75-69-4	Trichlorofluoromethane	1.3	0.16	0.22	0.029	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	8.2	ND	3.3	
107-13-1	Acrylonitrile	ND	0.82	ND	0.38	
75-35-4	1,1-Dichloroethene	ND	0.16	ND	0.041	
75-09-2	Methylene Chloride	0.87	0.82	0.25	0.23	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.16	ND	0.052	
76-13-1	Trichlorotrifluoroethane	0.54	0.16	0.071	0.021	
75-15-0	Carbon Disulfide	ND	8.2	ND	2.6	
156-60-5	trans-1,2-Dichloroethene	ND	0.16	ND	0.041	
75-34-3	1,1-Dichloroethane	ND	0.16	ND	0.040	
1634-04-4	Methyl tert-Butyl Ether	ND	0.16	ND	0.045	
108-05-4	Vinyl Acetate	ND	8.2	ND	2.3	
78-93-3	2-Butanone (MEK)	ND	8.2	ND	2.8	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

M1 = Matrix interference due to coelution with a non-target compound; results may be biased high.

RESULTS OF ANALYSIS

Page 2 of 3

Client: CH2M Hill

Client Sample ID: PZAA-P8-072012

CAS Project ID: P1203007

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1203007-008

Test Code: EPA TO-15

Date Collected: 7/20/12

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9

Date Received: 7/24/12

Analyst: Wida Ang

Date Analyzed: 7/27/12

Sampling Media: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:

Container ID: AC01016

Initial Pressure (psig): -3.36 Final Pressure (psig): 3.81

Canister Dilution Factor: 1.63

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.16	ND	0.041	
141-78-6	Ethyl Acetate	2.5	1.6	0.71	0.45	
110-54-3	n-Hexane	ND	0.82	ND	0.23	
67-66-3	Chloroform	0.27	0.16	0.055	0.033	
109-99-9	Tetrahydrofuran (THF)	ND	0.82	ND	0.28	
107-06-2	1,2-Dichloroethane	ND	0.16	ND	0.040	
71-55-6	1,1,1-Trichloroethane	ND	0.16	ND	0.030	
71-43-2	Benzene	0.69	0.16	0.22	0.051	
56-23-5	Carbon Tetrachloride	0.50	0.16	0.080	0.026	
110-82-7	Cyclohexane	ND	1.6	ND	0.47	
78-87-5	1,2-Dichloropropane	ND	0.16	ND	0.035	
75-27-4	Bromodichloromethane	ND	0.16	ND	0.024	
79-01-6	Trichloroethene	0.24	0.16	0.045	0.030	
123-91-1	1,4-Dioxane	ND	0.82	ND	0.23	
80-62-6	Methyl Methacrylate	ND	1.6	ND	0.40	
142-82-5	n-Heptane	ND	0.82	ND	0.20	
10061-01-5	cis-1,3-Dichloropropene	ND	0.82	ND	0.18	
108-10-1	4-Methyl-2-pentanone	ND	0.82	ND	0.20	
10061-02-6	trans-1,3-Dichloropropene	ND	0.82	ND	0.18	
79-00-5	1,1,2-Trichloroethane	ND	0.16	ND	0.030	
108-88-3	Toluene	3.5	0.82	0.92	0.22	
591-78-6	2-Hexanone	ND	0.82	ND	0.20	
124-48-1	Dibromochloromethane	ND	0.16	ND	0.019	
106-93-4	1,2-Dibromoethane	ND	0.16	ND	0.021	
123-86-4	n-Butyl Acetate	ND	0.82	ND	0.17	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P8-072012
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1203007
CAS Sample ID: P1203007-008

Test Code: EPA TO-15 Date Collected: 7/20/12
Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9 Date Received: 7/24/12
Analyst: Wida Ang Date Analyzed: 7/27/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC01016

Initial Pressure (psig): -3.36 Final Pressure (psig): 3.81

Canister Dilution Factor: 1.63

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.82	ND	0.17	
127-18-4	Tetrachloroethene	0.22	0.16	0.032	0.024	
108-90-7	Chlorobenzene	ND	0.16	ND	0.035	
100-41-4	Ethylbenzene	1.3	0.82	0.31	0.19	
179601-23-1	m,p-Xylenes	5.0	0.82	1.1	0.19	
75-25-2	Bromoform	ND	0.82	ND	0.079	
100-42-5	Styrene	ND	0.82	ND	0.19	
95-47-6	o-Xylene	0.88	0.82	0.20	0.19	
111-84-2	n-Nonane	ND	0.82	ND	0.16	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.16	ND	0.024	
98-82-8	Cumene	ND	0.82	ND	0.17	
80-56-8	alpha-Pinene	ND	0.82	ND	0.15	
103-65-1	n-Propylbenzene	ND	0.82	ND	0.17	
622-96-8	4-Ethyltoluene	ND	0.82	ND	0.17	
108-67-8	1,3,5-Trimethylbenzene	ND	0.82	ND	0.17	
95-63-6	1,2,4-Trimethylbenzene	0.92	0.82	0.19	0.17	
100-44-7	Benzyl Chloride	ND	0.82	ND	0.16	
541-73-1	1,3-Dichlorobenzene	ND	0.16	ND	0.027	
106-46-7	1,4-Dichlorobenzene	ND	0.16	ND	0.027	
95-50-1	1,2-Dichlorobenzene	ND	0.16	ND	0.027	
5989-27-5	d-Limonene	ND	0.82	ND	0.15	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.82	ND	0.084	
120-82-1	1,2,4-Trichlorobenzene	ND	0.82	ND	0.11	
91-20-3	Naphthalene	ND	0.82	ND	0.16	
87-68-3	Hexachlorobutadiene	ND	0.82	ND	0.076	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 1 of 3

Client: CH2M Hill

Client Sample ID: PZAA-C1-072012

CAS Project ID: P1203007

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1203007-009

Test Code: EPA TO-15

Date Collected: 7/20/12

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9

Date Received: 7/24/12

Analyst: Wida Ang

Date Analyzed: 7/27/12

Sampling Media: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01645

Initial Pressure (psig): -2.44 Final Pressure (psig): 3.74

Canister Dilution Factor: 1.50

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	1.7	0.75	0.96	0.44	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.5	0.75	0.52	0.15	
74-87-3	Chloromethane	0.45	0.30	0.22	0.15	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.75	ND	0.11	
75-01-4	Vinyl Chloride	ND	0.15	ND	0.059	
106-99-0	1,3-Butadiene	ND	0.30	ND	0.14	
74-83-9	Bromomethane	ND	0.15	ND	0.039	
75-00-3	Chloroethane	ND	0.15	ND	0.057	
64-17-5	Ethanol	47	7.5	25	4.0	
75-05-8	Acetonitrile	ND	0.75	ND	0.45	
107-02-8	Acrolein	ND	3.0	ND	1.3	
67-64-1	Acetone	16	7.5	6.7	3.2	
75-69-4	Trichlorofluoromethane	1.3	0.15	0.23	0.027	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	7.5	ND	3.1	
107-13-1	Acrylonitrile	ND	0.75	ND	0.35	
75-35-4	1,1-Dichloroethene	ND	0.15	ND	0.038	
75-09-2	Methylene Chloride	1.3	0.75	0.37	0.22	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.15	ND	0.048	
76-13-1	Trichlorotrifluoroethane	0.56	0.15	0.073	0.020	
75-15-0	Carbon Disulfide	ND	7.5	ND	2.4	
156-60-5	trans-1,2-Dichloroethene	ND	0.15	ND	0.038	
75-34-3	1,1-Dichloroethane	ND	0.15	ND	0.037	
1634-04-4	Methyl tert-Butyl Ether	ND	0.15	ND	0.042	
108-05-4	Vinyl Acetate	ND	7.5	ND	2.1	
78-93-3	2-Butanone (MEK)	ND	7.5	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C1-072012

CAS Project ID: P1203007

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1203007-009

Test Code: EPA TO-15

Date Collected: 7/20/12

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9

Date Received: 7/24/12

Analyst: Wida Ang

Date Analyzed: 7/27/12

Sampling Media: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01645

Initial Pressure (psig): -2.44 **Final Pressure (psig):** 3.74

Canister Dilution Factor: 1.50

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.15	ND	0.038	
141-78-6	Ethyl Acetate	6.6	1.5	1.8	0.42	
110-54-3	n-Hexane	0.83	0.75	0.24	0.21	
67-66-3	Chloroform	0.18	0.15	0.037	0.031	
109-99-9	Tetrahydrofuran (THF)	ND	0.75	ND	0.25	
107-06-2	1,2-Dichloroethane	ND	0.15	ND	0.037	
71-55-6	1,1,1-Trichloroethane	ND	0.15	ND	0.028	
71-43-2	Benzene	0.82	0.15	0.26	0.047	
56-23-5	Carbon Tetrachloride	0.47	0.15	0.075	0.024	
110-82-7	Cyclohexane	ND	1.5	ND	0.44	
78-87-5	1,2-Dichloropropane	ND	0.15	ND	0.032	
75-27-4	Bromodichloromethane	ND	0.15	ND	0.022	
79-01-6	Trichloroethene	0.22	0.15	0.041	0.028	
123-91-1	1,4-Dioxane	ND	0.75	ND	0.21	
80-62-6	Methyl Methacrylate	ND	1.5	ND	0.37	
142-82-5	n-Heptane	0.86	0.75	0.21	0.18	
10061-01-5	cis-1,3-Dichloropropene	ND	0.75	ND	0.17	
108-10-1	4-Methyl-2-pentanone	ND	0.75	ND	0.18	
10061-02-6	trans-1,3-Dichloropropene	ND	0.75	ND	0.17	
79-00-5	1,1,2-Trichloroethane	ND	0.15	ND	0.028	
108-88-3	Toluene	3.9	0.75	1.0	0.20	
591-78-6	2-Hexanone	ND	0.75	ND	0.18	
124-48-1	Dibromochloromethane	ND	0.15	ND	0.018	
106-93-4	1,2-Dibromoethane	ND	0.15	ND	0.020	
123-86-4	n-Butyl Acetate	0.77	0.75	0.16	0.16	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-C1-072012
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1203007
CAS Sample ID: P1203007-009

Test Code: EPA TO-15 Date Collected: 7/20/12
 Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9 Date Received: 7/24/12
 Analyst: Wida Ang Date Analyzed: 7/27/12
 Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
 Test Notes:
 Container ID: AC01645

Initial Pressure (psig): -2.44 Final Pressure (psig): 3.74

Canister Dilution Factor: 1.50

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.75	ND	0.16	
127-18-4	Tetrachloroethene	0.24	0.15	0.036	0.022	
108-90-7	Chlorobenzene	ND	0.15	ND	0.033	
100-41-4	Ethylbenzene	1.3	0.75	0.30	0.17	
179601-23-1	m,p-Xylenes	4.8	0.75	1.1	0.17	
75-25-2	Bromoform	ND	0.75	ND	0.073	
100-42-5	Styrene	ND	0.75	ND	0.18	
95-47-6	o-Xylene	0.90	0.75	0.21	0.17	
111-84-2	n-Nonane	ND	0.75	ND	0.14	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.15	ND	0.022	
98-82-8	Cumene	ND	0.75	ND	0.15	
80-56-8	alpha-Pinene	ND	0.75	ND	0.13	
103-65-1	n-Propylbenzene	ND	0.75	ND	0.15	
622-96-8	4-Ethyltoluene	ND	0.75	ND	0.15	
108-67-8	1,3,5-Trimethylbenzene	ND	0.75	ND	0.15	
95-63-6	1,2,4-Trimethylbenzene	0.94	0.75	0.19	0.15	
100-44-7	Benzyl Chloride	ND	0.75	ND	0.14	
541-73-1	1,3-Dichlorobenzene	ND	0.15	ND	0.025	
106-46-7	1,4-Dichlorobenzene	ND	0.15	ND	0.025	
95-50-1	1,2-Dichlorobenzene	ND	0.15	ND	0.025	
5989-27-5	d-Limonene	ND	0.75	ND	0.13	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.75	ND	0.078	
120-82-1	1,2,4-Trichlorobenzene	ND	0.75	ND	0.10	
91-20-3	Naphthalene	ND	0.75	ND	0.14	
87-68-3	Hexachlorobutadiene	ND	0.75	ND	0.070	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C2-072012

CAS Project ID: P1203007

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1203007-010

Test Code: EPA TO-15

Date Collected: 7/20/12

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9

Date Received: 7/24/12

Analyst: Wida Ang

Date Analyzed: 7/27/12

Sampling Media: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC00915

Initial Pressure (psig): -2.75 Final Pressure (psig): 3.65

Canister Dilution Factor: 1.54

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	1.5	0.77	0.88	0.45	M1
75-71-8	Dichlorodifluoromethane (CFC 12)	2.4	0.77	0.48	0.16	
74-87-3	Chloromethane	0.43	0.31	0.21	0.15	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.77	ND	0.11	
75-01-4	Vinyl Chloride	ND	0.15	ND	0.060	
106-99-0	1,3-Butadiene	ND	0.31	ND	0.14	
74-83-9	Bromomethane	ND	0.15	ND	0.040	
75-00-3	Chloroethane	ND	0.15	ND	0.058	
64-17-5	Ethanol	15	7.7	7.8	4.1	
75-05-8	Acetonitrile	ND	0.77	ND	0.46	
107-02-8	Acrolein	ND	3.1	ND	1.3	
67-64-1	Acetone	13	7.7	5.4	3.2	
75-69-4	Trichlorofluoromethane	1.3	0.15	0.24	0.027	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	7.7	ND	3.1	
107-13-1	Acrylonitrile	ND	0.77	ND	0.35	
75-35-4	1,1-Dichloroethene	ND	0.15	ND	0.039	
75-09-2	Methylene Chloride	1.2	0.77	0.33	0.22	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.15	ND	0.049	
76-13-1	Trichlorotrifluoroethane	0.57	0.15	0.074	0.020	
75-15-0	Carbon Disulfide	ND	7.7	ND	2.5	
156-60-5	trans-1,2-Dichloroethene	ND	0.15	ND	0.039	
75-34-3	1,1-Dichloroethane	ND	0.15	ND	0.038	
1634-04-4	Methyl tert-Butyl Ether	ND	0.15	ND	0.043	
108-05-4	Vinyl Acetate	ND	7.7	ND	2.2	
78-93-3	2-Butanone (MEK)	ND	7.7	ND	2.6	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

M1 = Matrix interference due to coelution with a non-target compound; results may be biased high.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C2-072012

CAS Project ID: P1203007

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1203007-010

Test Code: EPA TO-15

Date Collected: 7/20/12

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9

Date Received: 7/24/12

Analyst: Wida Ang

Date Analyzed: 7/27/12

Sampling Media: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:

Container ID: AC00915

Initial Pressure (psig): -2.75 Final Pressure (psig): 3.65

Canister Dilution Factor: 1.54

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.15	ND	0.039	
141-78-6	Ethyl Acetate	5.3	1.5	1.5	0.43	
110-54-3	n-Hexane	0.83	0.77	0.24	0.22	
67-66-3	Chloroform	0.18	0.15	0.038	0.032	
109-99-9	Tetrahydrofuran (THF)	ND	0.77	ND	0.26	
107-06-2	1,2-Dichloroethane	ND	0.15	ND	0.038	
71-55-6	1,1,1-Trichloroethane	ND	0.15	ND	0.028	
71-43-2	Benzene	1.0	0.15	0.33	0.048	
56-23-5	Carbon Tetrachloride	0.46	0.15	0.072	0.024	
110-82-7	Cyclohexane	ND	1.5	ND	0.45	
78-87-5	1,2-Dichloropropane	ND	0.15	ND	0.033	
75-27-4	Bromodichloromethane	ND	0.15	ND	0.023	
79-01-6	Trichloroethene	0.17	0.15	0.032	0.029	
123-91-1	1,4-Dioxane	ND	0.77	ND	0.21	
80-62-6	Methyl Methacrylate	ND	1.5	ND	0.38	
142-82-5	n-Heptane	0.81	0.77	0.20	0.19	
10061-01-5	cis-1,3-Dichloropropene	ND	0.77	ND	0.17	
108-10-1	4-Methyl-2-pentanone	ND	0.77	ND	0.19	
10061-02-6	trans-1,3-Dichloropropene	ND	0.77	ND	0.17	
79-00-5	1,1,2-Trichloroethane	ND	0.15	ND	0.028	
108-88-3	Toluene	3.5	0.77	0.93	0.20	
591-78-6	2-Hexanone	ND	0.77	ND	0.19	
124-48-1	Dibromochloromethane	ND	0.15	ND	0.018	
106-93-4	1,2-Dibromoethane	ND	0.15	ND	0.020	
123-86-4	n-Butyl Acetate	ND	0.77	ND	0.16	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-C2-072012
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1203007
CAS Sample ID: P1203007-010

Test Code: EPA TO-15 Date Collected: 7/20/12
Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9 Date Received: 7/24/12
Analyst: Wida Ang Date Analyzed: 7/27/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC00915

Initial Pressure (psig): -2.75 Final Pressure (psig): 3.65

Canister Dilution Factor: 1.54

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.77	ND	0.16	
127-18-4	Tetrachloroethene	0.30	0.15	0.045	0.023	
108-90-7	Chlorobenzene	ND	0.15	ND	0.033	
100-41-4	Ethylbenzene	1.1	0.77	0.25	0.18	
179601-23-1	m,p-Xylenes	4.0	0.77	0.93	0.18	
75-25-2	Bromoform	ND	0.77	ND	0.075	
100-42-5	Styrene	ND	0.77	ND	0.18	
95-47-6	o-Xylene	ND	0.77	ND	0.18	
111-84-2	n-Nonane	ND	0.77	ND	0.15	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.15	ND	0.022	
98-82-8	Cumene	ND	0.77	ND	0.16	
80-56-8	alpha-Pinene	ND	0.77	ND	0.14	
103-65-1	n-Propylbenzene	ND	0.77	ND	0.16	
622-96-8	4-Ethyltoluene	ND	0.77	ND	0.16	
108-67-8	1,3,5-Trimethylbenzene	ND	0.77	ND	0.16	
95-63-6	1,2,4-Trimethylbenzene	0.81	0.77	0.17	0.16	
100-44-7	Benzyl Chloride	ND	0.77	ND	0.15	
541-73-1	1,3-Dichlorobenzene	ND	0.15	ND	0.026	
106-46-7	1,4-Dichlorobenzene	ND	0.15	ND	0.026	
95-50-1	1,2-Dichlorobenzene	ND	0.15	ND	0.026	
5989-27-5	d-Limonene	ND	0.77	ND	0.14	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.77	ND	0.080	
120-82-1	1,2,4-Trichlorobenzene	ND	0.77	ND	0.10	
91-20-3	Naphthalene	ND	0.77	ND	0.15	
87-68-3	Hexachlorobutadiene	ND	0.77	ND	0.072	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C3-072012

CAS Project ID: P1203007

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1203007-011

Test Code: EPA TO-15

Date Collected: 7/20/12

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9

Date Received: 7/24/12

Analyst: Wida Ang

Date Analyzed: 7/27/12

Sampling Media: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01881

Initial Pressure (psig): -2.64 Final Pressure (psig): 3.50

Canister Dilution Factor: 1.51

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	4.4	0.76	2.5	0.44	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.4	0.76	0.49	0.15	
74-87-3	Chloromethane	0.38	0.30	0.18	0.15	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.76	ND	0.11	
75-01-4	Vinyl Chloride	ND	0.15	ND	0.059	
106-99-0	1,3-Butadiene	ND	0.30	ND	0.14	
74-83-9	Bromomethane	ND	0.15	ND	0.039	
75-00-3	Chloroethane	ND	0.15	ND	0.057	
64-17-5	Ethanol	29	7.6	15	4.0	
75-05-8	Acetonitrile	ND	0.76	ND	0.45	
107-02-8	Acrolein	ND	3.0	ND	1.3	
67-64-1	Acetone	15	7.6	6.2	3.2	
75-69-4	Trichlorofluoromethane	1.3	0.15	0.23	0.027	
67-63-0	2-Propanol (Isopropyl Alcohol)	11	7.6	4.4	3.1	
107-13-1	Acrylonitrile	ND	0.76	ND	0.35	
75-35-4	1,1-Dichloroethene	ND	0.15	ND	0.038	
75-09-2	Methylene Chloride	1.2	0.76	0.33	0.22	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.15	ND	0.048	
76-13-1	Trichlorotrifluoroethane	0.57	0.15	0.074	0.020	
75-15-0	Carbon Disulfide	ND	7.6	ND	2.4	
156-60-5	trans-1,2-Dichloroethene	ND	0.15	ND	0.038	
75-34-3	1,1-Dichloroethane	ND	0.15	ND	0.037	
1634-04-4	Methyl tert-Butyl Ether	ND	0.15	ND	0.042	
108-05-4	Vinyl Acetate	ND	7.6	ND	2.1	
78-93-3	2-Butanone (MEK)	ND	7.6	ND	2.6	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 2 of 3

Client: CH2M Hill

Client Sample ID: PZAA-C3-072012

CAS Project ID: P1203007

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1203007-011

Test Code: EPA TO-15

Date Collected: 7/20/12

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9

Date Received: 7/24/12

Analyst: Wida Ang

Date Analyzed: 7/27/12

Sampling Media: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01881

Initial Pressure (psig): -2.64 **Final Pressure (psig):** 3.50

Canister Dilution Factor: 1.51

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.15	ND	0.038	
141-78-6	Ethyl Acetate	5.2	1.5	1.5	0.42	
110-54-3	n-Hexane	0.86	0.76	0.25	0.21	
67-66-3	Chloroform	0.18	0.15	0.036	0.031	
109-99-9	Tetrahydrofuran (THF)	ND	0.76	ND	0.26	
107-06-2	1,2-Dichloroethane	ND	0.15	ND	0.037	
71-55-6	1,1,1-Trichloroethane	ND	0.15	ND	0.028	
71-43-2	Benzene	1.3	0.15	0.42	0.047	
56-23-5	Carbon Tetrachloride	0.49	0.15	0.078	0.024	
110-82-7	Cyclohexane	ND	1.5	ND	0.44	
78-87-5	1,2-Dichloropropane	ND	0.15	ND	0.033	
75-27-4	Bromodichloromethane	ND	0.15	ND	0.023	
79-01-6	Trichloroethene	ND	0.15	ND	0.028	
123-91-1	1,4-Dioxane	ND	0.76	ND	0.21	
80-62-6	Methyl Methacrylate	ND	1.5	ND	0.37	
142-82-5	n-Heptane	0.77	0.76	0.19	0.18	
10061-01-5	cis-1,3-Dichloropropene	ND	0.76	ND	0.17	
108-10-1	4-Methyl-2-pentanone	ND	0.76	ND	0.18	
10061-02-6	trans-1,3-Dichloropropene	ND	0.76	ND	0.17	
79-00-5	1,1,2-Trichloroethane	ND	0.15	ND	0.028	
108-88-3	Toluene	3.1	0.76	0.83	0.20	
591-78-6	2-Hexanone	ND	0.76	ND	0.18	
124-48-1	Dibromochloromethane	ND	0.15	ND	0.018	
106-93-4	1,2-Dibromoethane	ND	0.15	ND	0.020	
123-86-4	n-Butyl Acetate	ND	0.76	ND	0.16	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-C3-072012
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1203007
CAS Sample ID: P1203007-011

Test Code: EPA TO-15 Date Collected: 7/20/12
Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9 Date Received: 7/24/12
Analyst: Wida Ang Date Analyzed: 7/27/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC01881

Initial Pressure (psig): -2.64 Final Pressure (psig): 3.50

Canister Dilution Factor: 1.51

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.76	ND	0.16	
127-18-4	Tetrachloroethene	0.23	0.15	0.033	0.022	
108-90-7	Chlorobenzene	ND	0.15	ND	0.033	
100-41-4	Ethylbenzene	0.84	0.76	0.19	0.17	
179601-23-1	m,p-Xylenes	3.0	0.76	0.68	0.17	
75-25-2	Bromoform	ND	0.76	ND	0.073	
100-42-5	Styrene	ND	0.76	ND	0.18	
95-47-6	o-Xylene	ND	0.76	ND	0.17	
111-84-2	n-Nonane	ND	0.76	ND	0.14	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.15	ND	0.022	
98-82-8	Cumene	ND	0.76	ND	0.15	
80-56-8	alpha-Pinene	ND	0.76	ND	0.14	
103-65-1	n-Propylbenzene	ND	0.76	ND	0.15	
622-96-8	4-Ethyltoluene	ND	0.76	ND	0.15	
108-67-8	1,3,5-Trimethylbenzene	ND	0.76	ND	0.15	
95-63-6	1,2,4-Trimethylbenzene	ND	0.76	ND	0.15	
100-44-7	Benzyl Chloride	ND	0.76	ND	0.15	
541-73-1	1,3-Dichlorobenzene	ND	0.15	ND	0.025	
106-46-7	1,4-Dichlorobenzene	ND	0.15	ND	0.025	
95-50-1	1,2-Dichlorobenzene	ND	0.15	ND	0.025	
5989-27-5	d-Limonene	ND	0.76	ND	0.14	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.76	ND	0.078	
120-82-1	1,2,4-Trichlorobenzene	ND	0.76	ND	0.10	
91-20-3	Naphthalene	ND	0.76	ND	0.14	
87-68-3	Hexachlorobutadiene	ND	0.76	ND	0.071	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C4-072012

CAS Project ID: P1203007

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1203007-012

Test Code: EPA TO-15

Date Collected: 7/20/12

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9

Date Received: 7/24/12

Analyst: Wida Ang

Date Analyzed: 7/27/12

Sampling Media: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC00929

Initial Pressure (psig): -1.73 Final Pressure (psig): 3.63

Canister Dilution Factor: 1.41

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	1.1	0.71	0.66	0.41	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.5	0.71	0.50	0.14	
74-87-3	Chloromethane	0.38	0.28	0.18	0.14	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.71	ND	0.10	
75-01-4	Vinyl Chloride	ND	0.14	ND	0.055	
106-99-0	1,3-Butadiene	ND	0.28	ND	0.13	
74-83-9	Bromomethane	ND	0.14	ND	0.036	
75-00-3	Chloroethane	ND	0.14	ND	0.053	
64-17-5	Ethanol	20	7.1	11	3.7	
75-05-8	Acetonitrile	ND	0.71	ND	0.42	
107-02-8	Acrolein	ND	2.8	ND	1.2	
67-64-1	Acetone	14	7.1	6.0	3.0	
75-69-4	Trichlorofluoromethane	1.2	0.14	0.22	0.025	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	7.1	ND	2.9	
107-13-1	Acrylonitrile	ND	0.71	ND	0.32	
75-35-4	1,1-Dichloroethene	ND	0.14	ND	0.036	
75-09-2	Methylene Chloride	1.1	0.71	0.33	0.20	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.14	ND	0.045	
76-13-1	Trichlorotrifluoroethane	0.49	0.14	0.064	0.018	
75-15-0	Carbon Disulfide	ND	7.1	ND	2.3	
156-60-5	trans-1,2-Dichloroethene	ND	0.14	ND	0.036	
75-34-3	1,1-Dichloroethane	ND	0.14	ND	0.035	
1634-04-4	Methyl tert-Butyl Ether	ND	0.14	ND	0.039	
108-05-4	Vinyl Acetate	ND	7.1	ND	2.0	
78-93-3	2-Butanone (MEK)	ND	7.1	ND	2.4	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 2 of 3

Client: CH2M Hill

Client Sample ID: PZAA-C4-072012

CAS Project ID: P1203007

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1203007-012

Test Code: EPA TO-15

Date Collected: 7/20/12

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9

Date Received: 7/24/12

Analyst: Wida Ang

Date Analyzed: 7/27/12

Sampling Media: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC00929

Initial Pressure (psig): -1.73 **Final Pressure (psig):** 3.63

Canister Dilution Factor: 1.41

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.14	ND	0.036	
141-78-6	Ethyl Acetate	5.6	1.4	1.6	0.39	
110-54-3	n-Hexane	0.77	0.71	0.22	0.20	
67-66-3	Chloroform	0.20	0.14	0.042	0.029	
109-99-9	Tetrahydrofuran (THF)	ND	0.71	ND	0.24	
107-06-2	1,2-Dichloroethane	ND	0.14	ND	0.035	
71-55-6	1,1,1-Trichloroethane	ND	0.14	ND	0.026	
71-43-2	Benzene	5.3	0.14	1.7	0.044	
56-23-5	Carbon Tetrachloride	0.46	0.14	0.073	0.022	
110-82-7	Cyclohexane	ND	1.4	ND	0.41	
78-87-5	1,2-Dichloropropane	ND	0.14	ND	0.031	
75-27-4	Bromodichloromethane	ND	0.14	ND	0.021	
79-01-6	Trichloroethene	0.16	0.14	0.029	0.026	
123-91-1	1,4-Dioxane	ND	0.71	ND	0.20	
80-62-6	Methyl Methacrylate	ND	1.4	ND	0.34	
142-82-5	n-Heptane	0.71	0.71	0.17	0.17	
10061-01-5	cis-1,3-Dichloropropene	ND	0.71	ND	0.16	
108-10-1	4-Methyl-2-pentanone	ND	0.71	ND	0.17	
10061-02-6	trans-1,3-Dichloropropene	ND	0.71	ND	0.16	
79-00-5	1,1,2-Trichloroethane	ND	0.14	ND	0.026	
108-88-3	Toluene	3.8	0.71	1.0	0.19	
591-78-6	2-Hexanone	ND	0.71	ND	0.17	
124-48-1	Dibromochloromethane	ND	0.14	ND	0.017	
106-93-4	1,2-Dibromoethane	ND	0.14	ND	0.018	
123-86-4	n-Butyl Acetate	ND	0.71	ND	0.15	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-C4-072012
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1203007
CAS Sample ID: P1203007-012

Test Code: EPA TO-15 Date Collected: 7/20/12
Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9 Date Received: 7/24/12
Analyst: Wida Ang Date Analyzed: 7/27/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC00929

Initial Pressure (psig): -1.73 Final Pressure (psig): 3.63

Canister Dilution Factor: 1.41

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.71	ND	0.15	
127-18-4	Tetrachloroethene	0.23	0.14	0.033	0.021	
108-90-7	Chlorobenzene	ND	0.14	ND	0.031	
100-41-4	Ethylbenzene	0.89	0.71	0.20	0.16	
179601-23-1	m,p-Xylenes	3.3	0.71	0.77	0.16	
75-25-2	Bromoform	ND	0.71	ND	0.068	
100-42-5	Styrene	ND	0.71	ND	0.17	
95-47-6	o-Xylene	0.73	0.71	0.17	0.16	
111-84-2	n-Nonane	ND	0.71	ND	0.13	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.14	ND	0.021	
98-82-8	Cumene	ND	0.71	ND	0.14	
80-56-8	alpha-Pinene	ND	0.71	ND	0.13	
103-65-1	n-Propylbenzene	ND	0.71	ND	0.14	
622-96-8	4-Ethyltoluene	ND	0.71	ND	0.14	
108-67-8	1,3,5-Trimethylbenzene	ND	0.71	ND	0.14	
95-63-6	1,2,4-Trimethylbenzene	ND	0.71	ND	0.14	
100-44-7	Benzyl Chloride	ND	0.71	ND	0.14	
541-73-1	1,3-Dichlorobenzene	ND	0.14	ND	0.023	
106-46-7	1,4-Dichlorobenzene	ND	0.14	ND	0.023	
95-50-1	1,2-Dichlorobenzene	0.21	0.14	0.035	0.023	
5989-27-5	d-Limonene	ND	0.71	ND	0.13	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.71	ND	0.073	
120-82-1	1,2,4-Trichlorobenzene	ND	0.71	ND	0.095	
91-20-3	Naphthalene	ND	0.71	ND	0.13	
87-68-3	Hexachlorobutadiene	ND	0.71	ND	0.066	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 1 of 3

Client: CH2M Hill

Client Sample ID: PZAA-C3-072012-D

CAS Project ID: P1203007

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1203007-013

Test Code: EPA TO-15

Date Collected: 7/20/12

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9

Date Received: 7/24/12

Analyst: Wida Ang

Date Analyzed: 7/27/12

Sampling Media: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01783

Initial Pressure (psig): -1.74 Final Pressure (psig): 3.73

Canister Dilution Factor: 1.42

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	1.7	0.71	1.0	0.41	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.5	0.71	0.51	0.14	
74-87-3	Chloromethane	0.39	0.28	0.19	0.14	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.71	ND	0.10	
75-01-4	Vinyl Chloride	ND	0.14	ND	0.056	
106-99-0	1,3-Butadiene	ND	0.28	ND	0.13	
74-83-9	Bromomethane	ND	0.14	ND	0.037	
75-00-3	Chloroethane	ND	0.14	ND	0.054	
64-17-5	Ethanol	23	7.1	12	3.8	
75-05-8	Acetonitrile	ND	0.71	ND	0.42	
107-02-8	Acrolein	ND	2.8	ND	1.2	
67-64-1	Acetone	22	7.1	9.3	3.0	
75-69-4	Trichlorofluoromethane	1.3	0.14	0.22	0.025	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	7.1	ND	2.9	
107-13-1	Acrylonitrile	ND	0.71	ND	0.33	
75-35-4	1,1-Dichloroethene	ND	0.14	ND	0.036	
75-09-2	Methylene Chloride	1.2	0.71	0.34	0.20	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.14	ND	0.045	
76-13-1	Trichlorotrifluoroethane	0.58	0.14	0.076	0.019	
75-15-0	Carbon Disulfide	ND	7.1	ND	2.3	
156-60-5	trans-1,2-Dichloroethene	ND	0.14	ND	0.036	
75-34-3	1,1-Dichloroethane	ND	0.14	ND	0.035	
1634-04-4	Methyl tert-Butyl Ether	ND	0.14	ND	0.039	
108-05-4	Vinyl Acetate	ND	7.1	ND	2.0	
78-93-3	2-Butanone (MEK)	ND	7.1	ND	2.4	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 2 of 3

Client: CH2M Hill

Client Sample ID: PZAA-C3-072012-D

CAS Project ID: P1203007

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1203007-013

Test Code: EPA TO-15

Date Collected: 7/20/12

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9

Date Received: 7/24/12

Analyst: Wida Ang

Date Analyzed: 7/27/12

Sampling Media: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01783

Initial Pressure (psig): -1.74 **Final Pressure (psig):** 3.73

Canister Dilution Factor: 1.42

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.14	ND	0.036	
141-78-6	Ethyl Acetate	5.6	1.4	1.6	0.39	
110-54-3	n-Hexane	0.77	0.71	0.22	0.20	
67-66-3	Chloroform	0.17	0.14	0.035	0.029	
109-99-9	Tetrahydrofuran (THF)	ND	0.71	ND	0.24	
107-06-2	1,2-Dichloroethane	ND	0.14	ND	0.035	
71-55-6	1,1,1-Trichloroethane	ND	0.14	ND	0.026	
71-43-2	Benzene	1.3	0.14	0.41	0.044	
56-23-5	Carbon Tetrachloride	0.54	0.14	0.086	0.023	
110-82-7	Cyclohexane	ND	1.4	ND	0.41	
78-87-5	1,2-Dichloropropane	ND	0.14	ND	0.031	
75-27-4	Bromodichloromethane	ND	0.14	ND	0.021	
79-01-6	Trichloroethene	ND	0.14	ND	0.026	
123-91-1	1,4-Dioxane	ND	0.71	ND	0.20	
80-62-6	Methyl Methacrylate	ND	1.4	ND	0.35	
142-82-5	n-Heptane	ND	0.71	ND	0.17	
10061-01-5	cis-1,3-Dichloropropene	ND	0.71	ND	0.16	
108-10-1	4-Methyl-2-pentanone	ND	0.71	ND	0.17	
10061-02-6	trans-1,3-Dichloropropene	ND	0.71	ND	0.16	
79-00-5	1,1,2-Trichloroethane	ND	0.14	ND	0.026	
108-88-3	Toluene	3.2	0.71	0.84	0.19	
591-78-6	2-Hexanone	ND	0.71	ND	0.17	
124-48-1	Dibromochloromethane	ND	0.14	ND	0.017	
106-93-4	1,2-Dibromoethane	ND	0.14	ND	0.018	
123-86-4	n-Butyl Acetate	ND	0.71	ND	0.15	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 3 of 3

Client: CH2M Hill
Client Sample ID: PZAA-C3-072012-D
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1203007
 CAS Sample ID: P1203007-013

Test Code: EPA TO-15 Date Collected: 7/20/12
 Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9 Date Received: 7/24/12
 Analyst: Wida Ang Date Analyzed: 7/27/12
 Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
 Test Notes:
 Container ID: AC01783

Initial Pressure (psig): -1.74 Final Pressure (psig): 3.73

Canister Dilution Factor: 1.42

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.71	ND	0.15	
127-18-4	Tetrachloroethene	0.22	0.14	0.033	0.021	
108-90-7	Chlorobenzene	ND	0.14	ND	0.031	
100-41-4	Ethylbenzene	0.88	0.71	0.20	0.16	
179601-23-1	m,p-Xylenes	3.1	0.71	0.71	0.16	
75-25-2	Bromoform	ND	0.71	ND	0.069	
100-42-5	Styrene	ND	0.71	ND	0.17	
95-47-6	o-Xylene	ND	0.71	ND	0.16	
111-84-2	n-Nonane	ND	0.71	ND	0.14	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.14	ND	0.021	
98-82-8	Cumene	ND	0.71	ND	0.14	
80-56-8	alpha-Pinene	ND	0.71	ND	0.13	
103-65-1	n-Propylbenzene	ND	0.71	ND	0.14	
622-96-8	4-Ethyltoluene	ND	0.71	ND	0.14	
108-67-8	1,3,5-Trimethylbenzene	ND	0.71	ND	0.14	
95-63-6	1,2,4-Trimethylbenzene	ND	0.71	ND	0.14	
100-44-7	Benzyl Chloride	ND	0.71	ND	0.14	
541-73-1	1,3-Dichlorobenzene	ND	0.14	ND	0.024	
106-46-7	1,4-Dichlorobenzene	ND	0.14	ND	0.024	
95-50-1	1,2-Dichlorobenzene	ND	0.14	ND	0.024	
5989-27-5	d-Limonene	ND	0.71	ND	0.13	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.71	ND	0.073	
120-82-1	1,2,4-Trichlorobenzene	ND	0.71	ND	0.096	
91-20-3	Naphthalene	ND	0.71	ND	0.14	
87-68-3	Hexachlorobutadiene	ND	0.71	ND	0.067	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 1 of 3

Client: CH2M Hill

Client Sample ID: Method Blank

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1203007

CAS Sample ID: P120727-MB

Test Code: EPA TO-15

Date Collected: NA

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9

Date Received: NA

Analyst: Wida Ang

Date Analyzed: 7/27/12

Sampling Media: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:

Canister Dilution Factor: 1.00

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	ND	0.50	ND	0.29	
75-71-8	Dichlorodifluoromethane (CFC 12)	ND	0.50	ND	0.10	
74-87-3	Chloromethane	ND	0.20	ND	0.097	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.50	ND	0.072	
75-01-4	Vinyl Chloride	ND	0.10	ND	0.039	
106-99-0	1,3-Butadiene	ND	0.20	ND	0.090	
74-83-9	Bromomethane	ND	0.10	ND	0.026	
75-00-3	Chloroethane	ND	0.10	ND	0.038	
64-17-5	Ethanol	ND	5.0	ND	2.7	
75-05-8	Acetonitrile	ND	0.50	ND	0.30	
107-02-8	Acrolein	ND	2.0	ND	0.87	
67-64-1	Acetone	ND	5.0	ND	2.1	
75-69-4	Trichlorofluoromethane	ND	0.10	ND	0.018	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	5.0	ND	2.0	
107-13-1	Acrylonitrile	ND	0.50	ND	0.23	
75-35-4	1,1-Dichloroethene	ND	0.10	ND	0.025	
75-09-2	Methylene Chloride	ND	0.50	ND	0.14	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.10	ND	0.032	
76-13-1	Trichlorotrifluoroethane	ND	0.10	ND	0.013	
75-15-0	Carbon Disulfide	ND	5.0	ND	1.6	
156-60-5	trans-1,2-Dichloroethene	ND	0.10	ND	0.025	
75-34-3	1,1-Dichloroethane	ND	0.10	ND	0.025	
1634-04-4	Methyl tert-Butyl Ether	ND	0.10	ND	0.028	
108-05-4	Vinyl Acetate	ND	5.0	ND	1.4	
78-93-3	2-Butanone (MEK)	ND	5.0	ND	1.7	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 2 of 3

Client: CH2M Hill

Client Sample ID: Method Blank

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1203007

CAS Sample ID: P120727-MB

Test Code: EPA TO-15

Date Collected: NA

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9

Date Received: NA

Analyst: Wida Ang

Date Analyzed: 7/27/12

Sampling Media: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:

Canister Dilution Factor: 1.00

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.10	ND	0.025	
141-78-6	Ethyl Acetate	ND	1.0	ND	0.28	
110-54-3	n-Hexane	ND	0.50	ND	0.14	
67-66-3	Chloroform	ND	0.10	ND	0.020	
109-99-9	Tetrahydrofuran (THF)	ND	0.50	ND	0.17	
107-06-2	1,2-Dichloroethane	ND	0.10	ND	0.025	
71-55-6	1,1,1-Trichloroethane	ND	0.10	ND	0.018	
71-43-2	Benzene	ND	0.10	ND	0.031	
56-23-5	Carbon Tetrachloride	ND	0.10	ND	0.016	
110-82-7	Cyclohexane	ND	1.0	ND	0.29	
78-87-5	1,2-Dichloropropane	ND	0.10	ND	0.022	
75-27-4	Bromodichloromethane	ND	0.10	ND	0.015	
79-01-6	Trichloroethene	ND	0.10	ND	0.019	
123-91-1	1,4-Dioxane	ND	0.50	ND	0.14	
80-62-6	Methyl Methacrylate	ND	1.0	ND	0.24	
142-82-5	n-Heptane	ND	0.50	ND	0.12	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	ND	0.11	
108-10-1	4-Methyl-2-pentanone	ND	0.50	ND	0.12	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	ND	0.11	
79-00-5	1,1,2-Trichloroethane	ND	0.10	ND	0.018	
108-88-3	Toluene	ND	0.50	ND	0.13	
591-78-6	2-Hexanone	ND	0.50	ND	0.12	
124-48-1	Dibromochloromethane	ND	0.10	ND	0.012	
106-93-4	1,2-Dibromoethane	ND	0.10	ND	0.013	
123-86-4	n-Butyl Acetate	ND	0.50	ND	0.11	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 3 of 3

Client: CH2M Hill
Client Sample ID: Method Blank
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1203007
CAS Sample ID: P120727-MB

Test Code: EPA TO-15 Date Collected: NA
Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9 Date Received: NA
Analyst: Wida Ang Date Analyzed: 7/27/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:

Canister Dilution Factor: 1.00

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.50	ND	0.11	
127-18-4	Tetrachloroethene	ND	0.10	ND	0.015	
108-90-7	Chlorobenzene	ND	0.10	ND	0.022	
100-41-4	Ethylbenzene	ND	0.50	ND	0.12	
179601-23-1	m,p-Xylenes	ND	0.50	ND	0.12	
75-25-2	Bromoform	ND	0.50	ND	0.048	
100-42-5	Styrene	ND	0.50	ND	0.12	
95-47-6	o-Xylene	ND	0.50	ND	0.12	
111-84-2	n-Nonane	ND	0.50	ND	0.095	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.10	ND	0.015	
98-82-8	Cumene	ND	0.50	ND	0.10	
80-56-8	alpha-Pinene	ND	0.50	ND	0.090	
103-65-1	n-Propylbenzene	ND	0.50	ND	0.10	
622-96-8	4-Ethyltoluene	ND	0.50	ND	0.10	
108-67-8	1,3,5-Trimethylbenzene	ND	0.50	ND	0.10	
95-63-6	1,2,4-Trimethylbenzene	ND	0.50	ND	0.10	
100-44-7	Benzyl Chloride	ND	0.50	ND	0.097	
541-73-1	1,3-Dichlorobenzene	ND	0.10	ND	0.017	
106-46-7	1,4-Dichlorobenzene	ND	0.10	ND	0.017	
95-50-1	1,2-Dichlorobenzene	ND	0.10	ND	0.017	
5989-27-5	d-Limonene	ND	0.50	ND	0.090	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.50	ND	0.052	
120-82-1	1,2,4-Trichlorobenzene	ND	0.50	ND	0.067	
91-20-3	Naphthalene	ND	0.50	ND	0.095	
87-68-3	Hexachlorobutadiene	ND	0.50	ND	0.047	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

SURROGATE SPIKE RECOVERY RESULTS

Page 1 of 1

Client: CH2M Hill

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1203007

Test Code: EPA TO-15

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9

Date(s) Collected: 7/20/12

Analyst: Wida Ang

Date(s) Received: 7/24/12

Sampling Media: 6.0 L Summa Canister(s)

Date(s) Analyzed: 7/27/12

Test Notes:

Client Sample ID	CAS Sample ID	1,2-Dichloroethane-d4	Toluene-d8	Bromofluorobenzene		Data Qualifier
		Percent Recovered	Percent Recovered	Percent Recovered	Acceptance Limits	
Method Blank	P120727-MB	112	98	90	70-130	
Lab Control Sample	P120727-LCS	115	99	94	70-130	
PZAA-P1-072012	P1203007-001	114	101	93	70-130	
PZAA-P2-072012	P1203007-002	113	96	89	70-130	
PZAA-P3-072012	P1203007-003	114	94	94	70-130	
PZAA-P4-072012	P1203007-004	112	94	91	70-130	
PZAA-P5-072012	P1203007-005	109	99	96	70-130	
PZAA-P6-072012	P1203007-006	110	95	90	70-130	
PZAA-P7-072012	P1203007-007	110	94	92	70-130	
PZAA-P8-072012	P1203007-008	108	96	94	70-130	
PZAA-C1-072012	P1203007-009	109	102	96	70-130	
PZAA-C2-072012	P1203007-010	112	98	96	70-130	
PZAA-C3-072012	P1203007-011	111	97	95	70-130	
PZAA-C4-072012	P1203007-012	108	96	96	70-130	
PZAA-C3-072012-D	P1203007-013	112	97	93	70-130	

Surrogate percent recovery is verified and accepted based on the on-column result.

Reported results are shown in concentration units and as a result of the calculation, may vary slightly from the on-column percent recovery.

LABORATORY CONTROL SAMPLE SUMMARY

Page 1 of 3

Client: CH2M Hill

Client Sample ID: Lab Control Sample

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1203007

CAS Sample ID: P120727-LCS

Test Code: EPA TO-15

Date Collected: NA

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9

Date Received: NA

Analyst: Wida Ang

Date Analyzed: 7/27/12

Sampling Media: 6.0 L Summa Canister

Volume(s) Analyzed: 0.125 Liter(s)

Test Notes:

CAS #	Compound	Spike Amount µg/m³	Result µg/m³	% Recovery	CAS Acceptance Limits	Data Qualifier
115-07-1	Propene	204	260	127	59-137	
75-71-8	Dichlorodifluoromethane (CFC 12)	202	206	102	63-115	
74-87-3	Chloromethane	196	210	107	59-124	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	206	181	88	65-113	
75-01-4	Vinyl Chloride	200	207	104	59-121	
106-99-0	1,3-Butadiene	210	252	120	60-138	
74-83-9	Bromomethane	200	198	99	69-129	
75-00-3	Chloroethane	202	204	101	60-120	
64-17-5	Ethanol	958	1030	108	58-121	
75-05-8	Acetonitrile	202	232	115	64-129	
107-02-8	Acrolein	204	208	102	54-127	
67-64-1	Acetone	1,040	973	94	59-114	
75-69-4	Trichlorofluoromethane	210	199	95	66-108	
67-63-0	2-Propanol (Isopropyl Alcohol)	396	404	102	50-113	
107-13-1	Acrylonitrile	206	250	121	72-135	
75-35-4	1,1-Dichloroethene	218	223	102	70-117	
75-09-2	Methylene Chloride	212	190	90	61-108	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	214	240	112	70-131	
76-13-1	Trichlorotrifluoroethane	212	204	96	70-113	
75-15-0	Carbon Disulfide	208	210	101	65-112	
156-60-5	trans-1,2-Dichloroethene	202	212	105	71-119	
75-34-3	1,1-Dichloroethane	206	208	101	71-116	
1634-04-4	Methyl tert-Butyl Ether	204	221	108	67-116	
108-05-4	Vinyl Acetate	988	1240	126	59-142	
78-93-3	2-Butanone (MEK)	212	232	109	68-125	

Laboratory Control Sample percent recovery is verified and accepted based on the on-column result.

Reported results are shown in concentration units and as a result of the calculation, may vary slightly.

LABORATORY CONTROL SAMPLE SUMMARY

Page 2 of 3

Client: CH2M Hill

Client Sample ID: Lab Control Sample

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1203007

CAS Sample ID: P120727-LCS

Test Code: EPA TO-15

Date Collected: NA

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9

Date Received: NA

Analyst: Wida Ang

Date Analyzed: 7/27/12

Sampling Media: 6.0 L Summa Canister

Volume(s) Analyzed: 0.125 Liter(s)

Test Notes:

CAS #	Compound	Spike Amount µg/m³	Result µg/m³	% Recovery	CAS Acceptance Limits	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	214	224	105	69-119	
141-78-6	Ethyl Acetate	412	495	120	63-130	
110-54-3	n-Hexane	206	231	112	57-120	
67-66-3	Chloroform	222	225	101	69-111	
109-99-9	Tetrahydrofuran (THF)	208	222	107	57-123	
107-06-2	1,2-Dichloroethane	208	228	110	70-118	
71-55-6	1,1,1-Trichloroethane	204	204	100	73-119	
71-43-2	Benzene	208	187	90	66-121	
56-23-5	Carbon Tetrachloride	212	211	100	74-129	
110-82-7	Cyclohexane	402	396	99	70-113	
78-87-5	1,2-Dichloropropane	204	203	100	69-118	
75-27-4	Bromodichloromethane	204	215	105	75-124	
79-01-6	Trichloroethene	198	192	97	73-115	
123-91-1	1,4-Dioxane	206	225	109	71-123	
80-62-6	Methyl Methacrylate	414	447	108	72-127	
142-82-5	n-Heptane	202	204	101	68-120	
10061-01-5	cis-1,3-Dichloropropene	196	227	116	71-130	
108-10-1	4-Methyl-2-pentanone	210	245	117	69-130	
10061-02-6	trans-1,3-Dichloropropene	218	273	125	76-133	
79-00-5	1,1,2-Trichloroethane	202	200	99	73-120	
108-88-3	Toluene	208	193	93	67-111	
591-78-6	2-Hexanone	228	273	120	70-123	
124-48-1	Dibromochloromethane	216	214	99	75-129	
106-93-4	1,2-Dibromoethane	208	208	100	73-122	
123-86-4	n-Butyl Acetate	228	276	121	68-132	

Laboratory Control Sample percent recovery is verified and accepted based on the on-column result.
Reported results are shown in concentration units and as a result of the calculation, may vary slightly.

LABORATORY CONTROL SAMPLE SUMMARY

Page 3 of 3

Client: CH2M Hill

Client Sample ID: Lab Control Sample

CAS Project ID: P1203007

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P120727-LCS

Test Code: EPA TO-15

Date Collected: NA

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9

Date Received: NA

Analyst: Wida Ang

Date Analyzed: 7/27/12

Sampling Media: 6.0 L Summa Canister

Volume(s) Analyzed: 0.125 Liter(s)

Test Notes:

CAS #	Compound	Spike Amount µg/m³	Result µg/m³	% Recovery	CAS Acceptance Limits	Data Qualifier
111-65-9	n-Octane	206	212	103	68-116	
127-18-4	Tetrachloroethene	190	172	91	67-119	
108-90-7	Chlorobenzene	208	192	92	69-113	
100-41-4	Ethylbenzene	206	205	100	71-117	
179601-23-1	m,p-Xylenes	412	405	98	70-116	
75-25-2	Bromoform	216	202	94	69-127	
100-42-5	Styrene	208	213	102	71-125	
95-47-6	o-Xylene	200	201	101	70-116	
111-84-2	n-Nonane	202	225	111	68-116	
79-34-5	1,1,2,2-Tetrachloroethane	198	192	97	70-119	
98-82-8	Cumene	196	192	98	70-116	
80-56-8	alpha-Pinene	192	190	99	71-119	
103-65-1	n-Propylbenzene	198	202	102	71-119	
622-96-8	4-Ethyltoluene	204	210	103	71-119	
108-67-8	1,3,5-Trimethylbenzene	208	215	103	71-121	
95-63-6	1,2,4-Trimethylbenzene	200	209	105	73-127	
100-44-7	Benzyl Chloride	206	235	114	65-137	
541-73-1	1,3-Dichlorobenzene	206	197	96	68-123	
106-46-7	1,4-Dichlorobenzene	212	192	91	65-120	
95-50-1	1,2-Dichlorobenzene	204	186	91	67-121	
5989-27-5	d-Limonene	206	212	103	67-130	
96-12-8	1,2-Dibromo-3-chloropropane	202	198	98	72-133	
120-82-1	1,2,4-Trichlorobenzene	200	192	96	62-133	
91-20-3	Naphthalene	178	183	103	56-138	
87-68-3	Hexachlorobutadiene	208	178	86	60-128	

Laboratory Control Sample percent recovery is verified and accepted based on the on-column result.

Reported results are shown in concentration units and as a result of the calculation, may vary slightly.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1203007

Method Blank Summary

Test Code:	EPA TO-15	
Instrument ID:	Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9	Lab File ID: 07271203.D
Analyst:	Wida Ang	Date Analyzed: 7/27/12
Sampling Media:	6.0 L Summa Canister(s)	Time Analyzed: 06:32
Test Notes:		

Client Sample ID	CAS Sample ID	Lab File ID	Time Analyzed
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Lab Control Sample	P120727-LCS	07271204.D	07:05
PZAA-P1-072012	P1203007-001	07271211.D	12:30
PZAA-P2-072012	P1203007-002	07271212.D	13:03
PZAA-P3-072012	P1203007-003	07271213.D	13:35
PZAA-P4-072012	P1203007-004	07271214.D	14:08
PZAA-P5-072012	P1203007-005	07271215.D	15:12
PZAA-P6-072012	P1203007-006	07271216.D	15:44
PZAA-P7-072012	P1203007-007	07271217.D	16:17
PZAA-P8-072012	P1203007-008	07271218.D	16:50
PZAA-C1-072012	P1203007-009	07271219.D	17:24
PZAA-C2-072012	P1203007-010	07271220.D	17:57
PZAA-C3-072012	P1203007-011	07271221.D	18:29
PZAA-C4-072012	P1203007-012	07271222.D	19:02
PZAA-C3-072012-D	P1203007-013	07271223.D	19:34

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

CAS Project ID: P1203007

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

Internal Standard Area and RT Summary

Test Code: EPA TO-15

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS9

Lab File ID: 07271201.D

Analyst: Wida Ang

Date Analyzed: 7/27/12

Sampling Media: 6.0 L Summa Canister(s)

Time Analyzed: 05:27

Test Notes:

	IS1 (BCM)		IS2 (DFB)		IS3 (CBZ)	
	AREA #	RT #	AREA #	RT #	AREA #	RT #
24 Hour Standard	154311	10.75	632157	12.75	289868	16.43
Upper Limit	216035	11.08	885020	13.08	405815	16.76
Lower Limit	92587	10.42	379294	12.42	173921	16.10

Client Sample ID

01	Method Blank	147883	10.74	594867	12.74	274554	16.43
02	Lab Control Sample	149551	10.75	632351	12.75	280697	16.43
03	PZAA-P1-072012	153898	10.74	633840	12.74	283964	16.43
04	PZAA-P2-072012	148698	10.74	617008	12.75	291137	16.43
05	PZAA-P3-072012	154532	10.74	652031	12.75	306246	16.43
06	PZAA-P4-072012	164792	10.74	669354	12.75	322913	16.43
07	PZAA-P5-072012	175353	10.74	719249	12.75	324607	16.43
08	PZAA-P6-072012	167521	10.75	683977	12.75	322379	16.43
09	PZAA-P7-072012	163869	10.74	668825	12.75	313127	16.43
10	PZAA-P8-072012	167214	10.74	671877	12.75	310864	16.43
11	PZAA-C1-072012	162088	10.74	661395	12.75	294235	16.43
12	PZAA-C2-072012	160448	10.74	663635	12.75	295739	16.43
13	PZAA-C3-072012	159465	10.74	644618	12.75	295366	16.43
14	PZAA-C4-072012	166017	10.74	678649	12.75	306211	16.43
15	PZAA-C3-072012-D	159579	10.74	660767	12.75	299766	16.43
16							
17							
18							
19							
20							

IS1 (BCM) = Bromochloromethane

IS2 (DFB) = 1,4-Difluorobenzene

IS3 (CBZ) = Chlorobenzene-d5

AREA UPPER LIMIT = 140% of internal standard area

AREA LOWER LIMIT = 60% of internal standard area

RT UPPER LIMIT = 0.33 minutes of internal standard RT

RT LOWER LIMIT = 0.33 minutes of internal standard RT

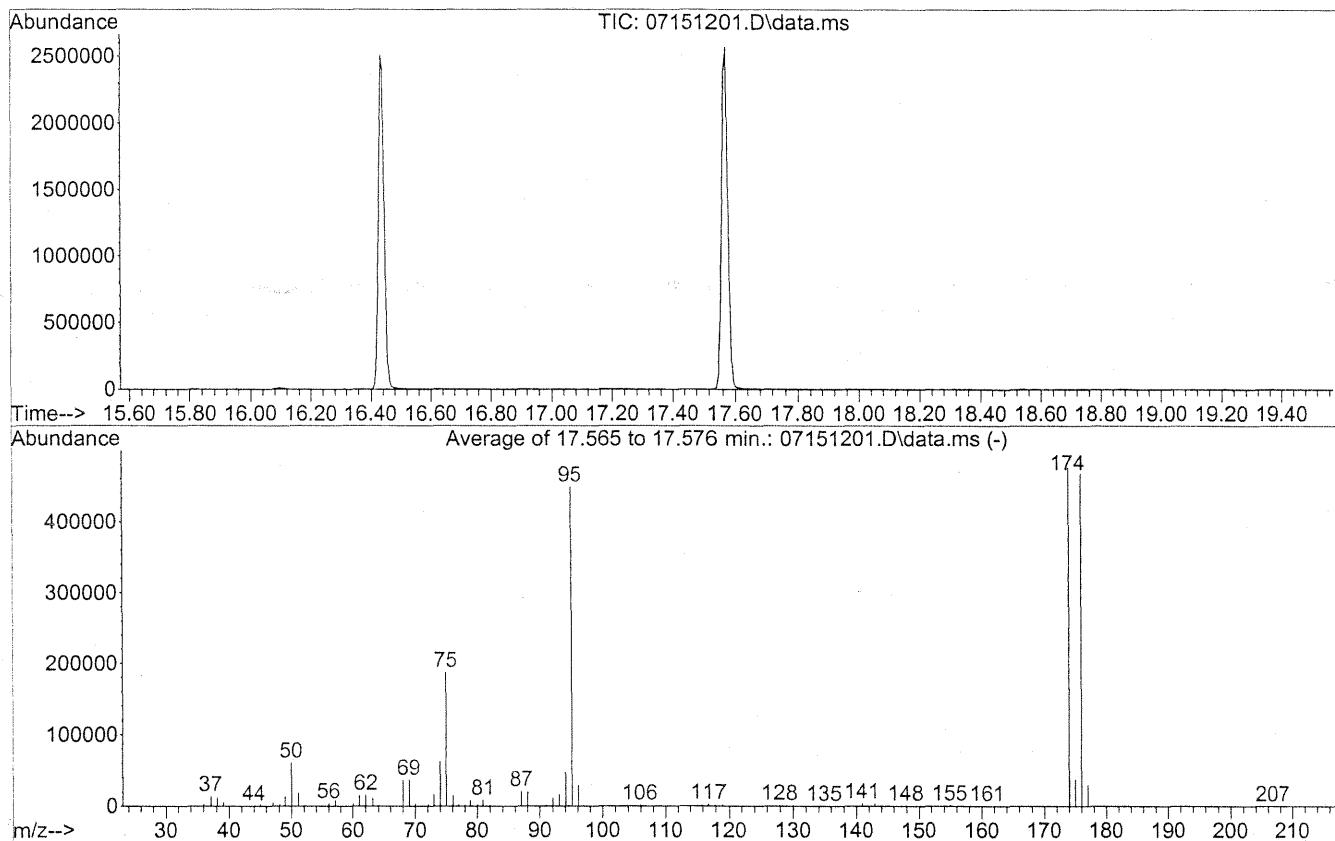
Column used to flag values outside QC limits with an I.

I = Internal standard not within the specified limits.

Data Path : J:\MS09\Data\2012_07\15\
 Data File : 07151201.D
 Acq On : 15 Jul 2012 7:27
 Operator : WA
 Sample : 25ng TO-15 BFB STD
 Misc : S25-07121201 (STD00032)
 ALS Vial : 4 Sample Multiplier: 1

Integration File: RTEINT.P

Method : J:\MS09\Methods\R9071512.M
 Title : EPA TO-15 per SOP VOA-TO15 (CASS TO-15/GC-MS)
 Last Update : Sun Jul 15 12:39:29 2012



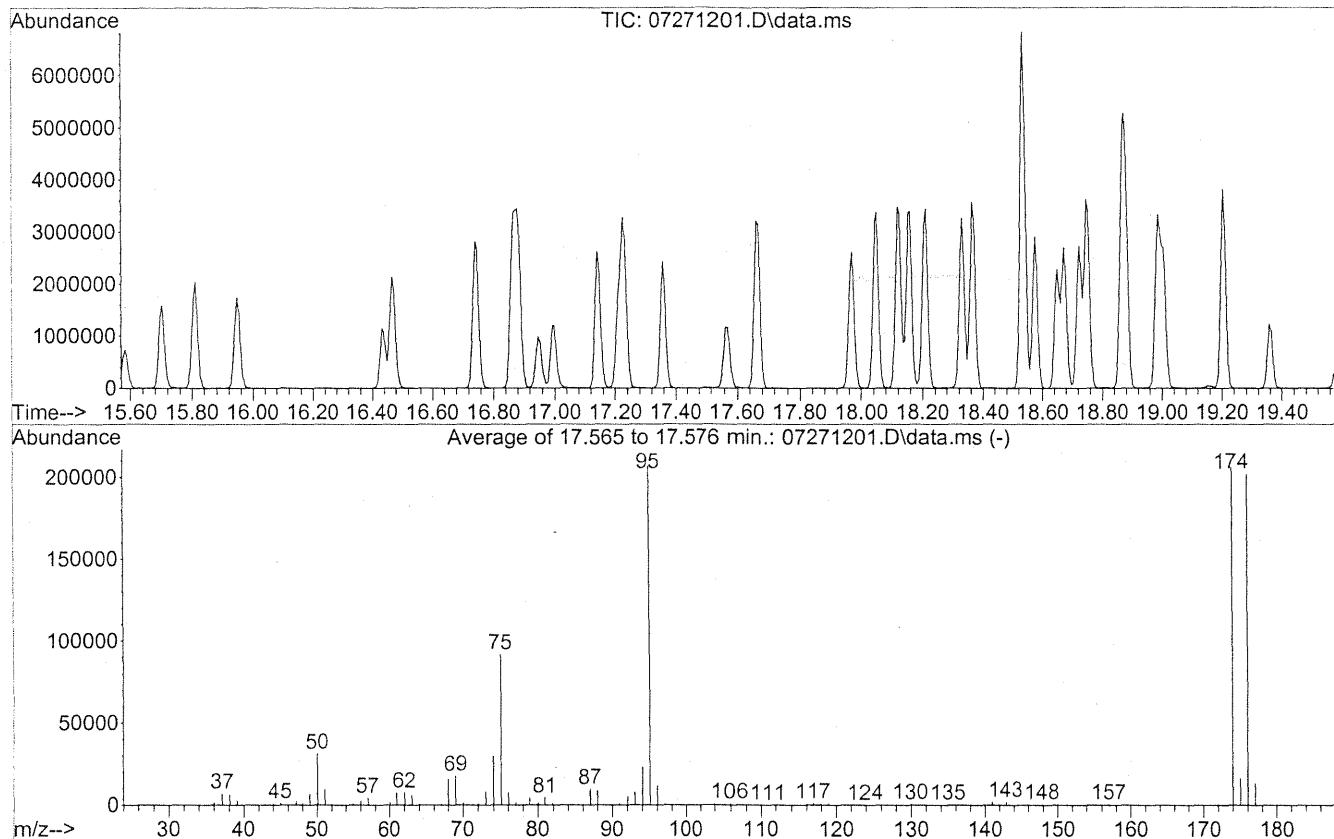
AutoFind: Scans 2483, 2484, 2485; Background Corrected with Scan 2475

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	8	40	13.5	60541	PASS
75	95	30	66	41.7	187493	PASS
95	95	100	100	100.0	449152	PASS
96	95	5	9	6.5	29195	PASS
173	174	0.00	2	0.0	0	PASS
174	95	50	120	106.0	476032	PASS
175	174	4	9	7.8	37125	PASS
176	174	93	101	98.2	467584	PASS
177	176	5	9	6.3	29331	PASS

Data Path : J:\MS09\Data\2012_07\27\
 Data File : 07271201.D
 Acq On : 27 Jul 2012 5:27
 Operator : WA
 Sample : 25ng TO-15 CCV STD(125mL)
 Misc : S25-07121201_S25-07121205
 ALS Vial : 16 Sample Multiplier: 1

Integration File: RTEINT.P

Method : J:\MS09\Methods\R9071512.M
 Title : EPA TO-15 per SOP VOA-TO15 (CASS TO-15/GC-MS)
 Last Update : Sun Jul 15 12:39:29 2012



AutoFind: Scans 2483, 2484, 2485; Background Corrected with Scan 2475

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	8	40	15.1	31245	PASS
75	95	30	66	44.4	91683	PASS
95	95	100	100	100.0	206597	PASS
96	95	5	9	5.6	11594	PASS
173	174	0.00	2	0.0	0	PASS
174	95	50	120	99.6	205803	PASS
175	174	4	9	7.8	16055	PASS
176	174	93	101	98.0	201664	PASS
177	176	5	9	6.5	13178	PASS

Evaluate Continuing Calibration Report

Data Path : J:\MS09\Data\2012_07\27\
 Data File : 07271201.D
 Acq On : 27 Jul 2012 5:27
 Operator : WA
 Sample : 25ng TO-15 CCV STD(125mL)
 Misc : S25-07121201_S25-07121205
 ALS Vial : 16 Sample Multiplier: 1

Quant Time: Jul 27 07:17:09 2012
 Quant Method : J:\MS09\Methods\R9071512.M
 Quant Title : EPA TO-15 per SOP VOA-TO15 (CASS TO-15/GC-MS)
 QLast Update : Sun Jul 15 12:39:29 2012
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 200%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	IR Bromochloromethane (IS1)	1.000	1.000	0.0	78	-0.01
2	T Propene	1.081	1.328	-22.8	85	0.00
3	T Dichlorodifluoromethane (CF)	2.423	2.357	2.7	77	-0.01
4	T Chloromethane	1.545	1.669	-8.0	82	-0.01
5	T 1,2-Dichloro-1,1,2,2-tetrafluoroethane	1.467	1.281	12.7	71	0.00
6	T Vinyl Chloride	1.717	1.791	-4.3	81	-0.02
7	T 1,3-Butadiene	0.997	1.137	-14.0	77	-0.01
8	T Bromomethane	1.174	1.082	7.8	70	-0.01
9	T Chloroethane	0.796	0.754	5.3	74	-0.01
10	T Ethanol	0.704	0.703	0.1	79	-0.06
11	T Acetonitrile	1.426	1.460	-2.4	81	-0.03
12	T Acrolein	0.538	0.536	0.4	76	-0.02
13	T Acetone	0.738	0.684	7.3	77	-0.03
14	T Trichlorofluoromethane	2.122	2.125	-0.1	79	-0.01
15	T 2-Propanol (Isopropanol)	1.579	1.625	-2.9	84	-0.03
16	T Acrylonitrile	1.039	1.175	-13.1	78	-0.02
17	T 1,1-Dichloroethene	1.081	1.040	3.8	73	-0.01
18	T 2-Methyl-2-Propanol (tert-B)	2.196	2.514	-14.5	79	-0.03
19	T Methylene Chloride	1.252	1.100	12.1	75	-0.02
20	T 3-Chloro-1-propene (Allyl Chloride)	1.122	1.225	-9.2	79	-0.02
21	T Trichlorotrifluoroethane	1.080	0.983	9.0	70	-0.01
22	T Carbon Disulfide	4.127	4.134	-0.2	76	-0.01
23	T trans-1,2-Dichloroethene	1.468	1.512	-3.0	79	-0.01
24	T 1,1-Dichloroethane	1.789	1.804	-0.8	78	-0.01
25	T Methyl tert-Butyl Ether	3.018	3.234	-7.2	78	-0.01
26	T Vinyl Acetate	0.176	0.218	-23.9	78	-0.02
27	T 2-Butanone (MEK)	0.629	0.661	-5.1	74	-0.01
28	T cis-1,2-Dichloroethene	1.355	1.395	-3.0	78	-0.01
29	T Diisopropyl Ether	0.847	0.889	-5.0	76	-0.01
30	T Ethyl Acetate	0.334	0.386	-15.6	79	-0.01
31	T n-Hexane	1.641	1.730	-5.4	78	-0.01
32	T Chloroform	1.829	1.858	-1.6	78	-0.02
33	S 1,2-Dichloroethane-d4 (SS1)	1.182	1.327	-12.3	89	-0.01
34	T Tetrahydrofuran (THF)	0.650	0.666	-2.5	76	0.00
35	T Ethyl tert-Butyl Ether	1.230	1.285	-4.5	75	0.00
36	T 1,2-Dichloroethane	1.339	1.418	-5.9	81	-0.01
37	IR 1,4-Difluorobenzene (IS2)	1.000	1.000	0.0	78	-0.01
38	T 1,1,1-Trichloroethane	0.423	0.431	-1.9	79	-0.01

Evaluate Continuing Calibration Report

Data Path : J:\MS09\Data\2012_07\27\
 Data File : 07271201.D
 Acq On : 27 Jul 2012 5:27
 Operator : WA
 Sample : 25ng TO-15 CCV STD(125mL)
 Misc : S25-07121201_S25-07121205
 ALS Vial : 16 Sample Multiplier: 1

Quant Time: Jul 27 07:17:09 2012

Quant Method : J:\MS09\Methods\R9071512.M

Quant Title : EPA TO-15 per SOP VOA-TO15 (CASS TO-15/GC-MS)

QLast Update : Sun Jul 15 12:39:29 2012

Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 200%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
39 T	Isopropyl Acetate	0.134	0.149	-11.2	74	-0.01
40 T	1-Butanol	0.187	0.237	-26.7	77	-0.03
41 T	Benzene	1.168	1.014	13.2	74	-0.01
42 T	Carbon Tetrachloride	0.350	0.356	-1.7	77	0.00
43 T	Cyclohexane	0.410	0.413	-0.7	75	-0.01
44 T	tert-Amyl Methyl Ether	0.714	0.747	-4.6	76	-0.01
45 T	1,2-Dichloropropane	0.246	0.242	1.6	73	0.00
46 T	Bromodichloromethane	0.345	0.357	-3.5	74	-0.01
47 T	Trichloroethene	0.329	0.310	5.8	72	0.00
48 T	1,4-Dioxane	0.206	0.218	-5.8	74	0.00
49 T	2,2,4-Trimethylpentane (Iso)	1.013	1.037	-2.4	77	-0.01
50 T	Methyl Methacrylate	0.112	0.116	-3.6	71	-0.01
51 T	n-Heptane	0.255	0.256	-0.4	75	0.00
52 T	cis-1,3-Dichloropropene	0.376	0.422	-12.2	74	0.00
53 T	4-Methyl-2-pentanone	0.200	0.227	-13.5	78	0.00
54 T	trans-1,3-Dichloropropene	0.320	0.393	-22.8	78	0.00
55 T	1,1,2-Trichloroethane	0.273	0.272	0.4	75	0.00
56 IR	Chlorobenzene-d5 (IS3)	1.000	1.000	0.0	85	0.00
57 S	Toluene-d8 (SS2)	2.419	2.299	5.0	78	0.00
58 T	Toluene	2.827	2.497	11.7	72	0.00
59 T	2-Hexanone	0.888	0.997	-12.3	79	0.00
60 T	Dibromochloromethane	0.717	0.688	4.0	75	0.00
61 T	1,2-Dibromoethane	0.710	0.676	4.8	73	0.00
62 T	n-Butyl Acetate	1.121	1.267	-13.0	82	0.00
63 T	n-Octane	0.490	0.473	3.5	75	0.00
64 T	Tetrachloroethene	0.890	0.782	12.1	69	0.00
65 T	Chlorobenzene	1.858	1.636	11.9	73	0.00
66 T	Ethylbenzene	2.952	2.870	2.8	76	0.00
67 T	m- & p-Xylenes	2.364	2.309	2.3	75	0.00
68 T	Bromoform	0.651	0.641	1.5	73	0.00
69 T	Styrene	1.814	1.809	0.3	73	0.00
70 T	o-Xylene	2.481	2.433	1.9	76	0.00
71 T	n-Nonane	1.006	1.051	-4.5	81	0.00
72 T	1,1,2,2-Tetrachloroethane	1.147	1.106	3.6	74	0.00
73 S	Bromofluorobenzene (SS3)	1.098	1.058	3.6	81	0.00
74 T	Cumene	3.279	3.119	4.9	76	0.00
75 T	alpha-Pinene	1.542	1.509	2.1	75	0.00
76 T	n-Propylbenzene	3.833	3.819	0.4	77	0.00

Evaluate Continuing Calibration Report

Data Path : J:\MS09\Data\2012_07\27\
 Data File : 07271201.D
 Acq On : 27 Jul 2012 5:27
 Operator : WA
 Sample : 25ng TO-15 CCV STD(125mL)
 Misc : S25-07121201_S25-07121205
 ALS Vial : 16 Sample Multiplier: 1

Quant Time: Jul 27 07:17:09 2012
 Quant Method : J:\MS09\Methods\R9071512.M
 Quant Title : EPA TO-15 per SOP VOA-TO15 (CASS TO-15/GC-MS)
 QLast Update : Sun Jul 15 12:39:29 2012
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 200%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev (min)
77 T	3-Ethyltoluene	3.116	2.950	5.3	71	0.00
78 T	4-Ethyltoluene	2.995	3.032	-1.2	80	0.00
79 T	1,3,5-Trimethylbenzene	2.468	2.452	0.6	75	0.00
80 T	alpha-Methylstyrene	1.399	1.338	4.4	70	0.00
81 T	2-Ethyltoluene	3.168	3.045	3.9	74	0.00
82 T	1,2,4-Trimethylbenzene	2.577	2.556	0.8	75	0.00
83 T	n-Decane	1.230	1.290	-4.9	80	0.00
84 T	Benzyl Chloride	1.828	2.089	-14.3	72	0.00
85 T	1,3-Dichlorobenzene	1.624	1.482	8.7	70	0.00
86 T	1,4-Dichlorobenzene	1.668	1.472	11.8	69	0.00
87 T	sec-Butylbenzene	3.468	3.370	2.8	74	0.00
88 T	4-Isopropyltoluene (p-Cymen)	3.393	3.303	2.7	72	0.00
89 T	1,2,3-Trimethylbenzene	2.670	2.612	2.2	73	0.00
90 T	1,2-Dichlorobenzene	1.607	1.438	10.5	69	0.00
91 T	d-Limonene	0.875	0.912	-4.2	75	0.00
92 T	1,2-Dibromo-3-Chloropropane	0.527	0.490	7.0	66	0.00
93 T	n-Undecane	1.205	1.306	-8.4	79	0.00
94 T	1,2,4-Trichlorobenzene	1.154	1.054	8.7	69	0.00
95 T	Naphthalene	4.063	3.931	3.2	72	0.00
96 T	n-Dodecane	1.192	1.334	-11.9	81	0.00
97 T	Hexachlorobutadiene	0.779	0.643	17.5	70	0.00
98 T	Cyclohexanone	0.746	0.748	-0.3	74	-0.01
99 T	tert-Butylbenzene	2.661	2.509	5.7	73	0.00
100 T	n-Butylbenzene	2.598	2.634	-1.4	74	0.00

(#) = Out of Range

SPCC's out = 0 CCC's out = 0

Method Path : J:\MS09\Methods\

Method File : R9071512.M

Title : EPA TO-15 per SOP VOA-TO15 (CASS TO-15/GC-MS)

Last Update : Sun Jul 15 12:39:29 2012

Response Via : Initial Calibration

Calibration Files

0.1 =07151202.D 0.2 =07151203.D 0.5 =07151204.D 1.0 =07151205.D 5.0 =07151206.D 25 =07151207.D
 50 =07151208.D 100 =07151209.D

	Compound	0.1	0.2	0.5	1.0	5.0	25	50	100	Avg	%RSD
1) T	Bromochloromethane...										
2) T	Propene	0.940	1.162	0.815	1.160	1.213	1.228	1.051	1.081	14.32	
3) T	Dichlorodifluo...	2.805	2.478	2.557	2.679	2.377	2.388	2.154	1.944	2.423	
4) T	Chloromethane	1.755	1.776	1.537	1.731	1.397	1.580	1.407	1.176	1.545	
5) T	1,2-Dichloro-1...	1.668	1.664	1.491	1.610	1.391	1.410	1.285	1.217	1.467	
6) T	Vinyl Chloride	1.745	1.986	1.639	1.943	1.583	1.729	1.624	1.489	1.717	
7) T	1,3-Butadiene	0.992	0.920	0.904	0.970	0.950	1.151	1.092	0.998	0.997	
8) T	Bromomethane	1.316	1.161	1.182	1.232	1.122	1.202	1.108	1.071	1.174	
9) T	Chloroethane	0.769	0.885	0.798	0.868	0.756	0.794	0.779	0.719	0.796	
10) T	Ethanol	0.945	0.746	0.644	0.672	0.599	0.689	0.705	0.631	0.704	
11) T	Acetonitrile	1.590	1.464	1.466	1.466	1.329	1.405	1.443	1.289	1.426	
12) T	Acrolein	0.683	0.538	0.450	0.587	0.471	0.546	0.540	0.490	0.538	
13) T	Acetone	0.941	0.825	0.690	0.784	0.666	0.693	0.687	0.622	0.738	
14) T	Trichlorofluor...	2.316	2.241	2.123	2.274	2.006	2.098	2.020	1.894	2.122	
15) T	2-Propanol (Is...)	2.206	2.033	1.480	2.225	1.243	1.500	1.050	0.899	1.579	
16) T	Acrylonitrile	0.787	0.892	1.132	1.044	1.166	1.178	1.074	1.039	14.20	
17) T	1,1-Dichloroet...	1.122	1.047	1.094	1.153	1.049	1.102	1.064	1.020	1.081	
18) T	2-Methyl-2-Pro...	2.037	2.083	2.341	2.200	2.459	2.057				
19) T	Methylene Chlo...	1.785	1.328	1.343	1.072	1.138	1.082	1.015	1.252	21.35	
20) T	3-Chloro-1-Pro...	1.021	1.124	1.115	1.136	1.080	1.200	1.184	1.114	1.122	
21) T	Trichlorotrifl...	1.122	1.130	1.063	1.204	1.032	1.092	1.015	0.987	1.080	
22) T	Carbon Disulfide	4.492	4.243	4.021	4.150	3.886	4.203	4.147	3.875	4.127	
23) T	trans-1,2-Dich...	1.634	1.499	1.429	1.542	1.376	1.490	1.419	1.357	1.468	
24) T	1,1-Dichloroet...	1.844	1.884	1.759	1.936	1.699	1.809	1.740	1.641	1.789	
25) T	Methyl tert-Bu...	3.004	2.981	2.796	3.136	2.986	3.223	3.069	2.947	3.018	
26) T	Vinyl Acetate	0.128	0.141	0.163	0.141	0.128	0.216	0.210	0.200	0.176	
27) T	2-Butanone (MEK)	0.523	0.627	0.644	0.697	0.688	0.598	0.629			
28) T	cis-1,2-Dichlo...	1.438	1.367	1.317	1.407	1.298	1.400	1.342	1.271	1.355	
29) T	Diisopropyl Ether	0.826	0.729	0.852	0.895	0.838	0.909	0.876	0.849	0.847	
30) T	Ethyl Acetate	0.217	0.309	0.360	0.347	0.378	0.371	0.355	0.334	0.334	
31) T	n-Hexane	1.693	1.606	1.557	1.793	1.582	1.724	1.644	1.527	1.641	

Method Path : J:\MS09\Methods\

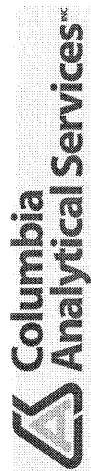
Method File : R9071512.M

Title : EPA TO-15 per SOP VOA-T015 (CASS TO-15/GC-MS)

32) T	Chloroform	2.008	1.894	1.757	1.924	1.695	1.862	1.777	1.715	1.829	6.03
33) S	1,2-Dichloroet...	1.157	1.179	1.185	1.246	1.192	1.161	1.170	1.182	2.39	
34) T	Tetrahydrofura...	0.670	0.641	0.637	0.696	0.635	0.684	0.636	0.600	0.650	4.80
35) T	Ethyl tert-But...	1.178	1.050	1.219	1.342	1.194	1.333	1.289	1.237	1.230	7.72
36) T	1,2-Dichloroet...	1.325	1.436	1.315	1.474	1.270	1.355	1.291	1.250	1.339	5.88
37) IR	1,4-Difluorobenzen...	0.534	0.413	0.405	0.426	0.394	0.428	0.405	0.380	0.423	11.27
38) T	1,1,1-Trichlor...	0.113	0.128	0.119	0.132	0.134	0.158	0.151	0.138	0.134	11.22
39) T	Isopropyl Acetate	0.418	0.413	0.399	0.435	0.393	0.433	0.407	0.384	0.410	4.47
40) T	1-Butanol	0.773	0.689	0.647	0.718	0.681	0.766	0.734	0.707	0.714	5.97
41) T	Benzene	0.261	0.240	0.247	0.261	0.232	0.259	0.241	0.226	0.246	5.48
42) T	Carbon Tetrach...	0.386	0.357	0.350	0.354	0.330	0.362	0.344	0.321	0.350	5.69
43) T	Cyclohexane	0.326	0.357	0.318	0.360	0.308	0.337	0.321	0.308	0.329	6.18
44) T	tert-Amyl Meth...	0.200	0.192	0.180	0.210	0.203	0.231	0.221	0.209	0.206	7.72
45) T	1,2-Dichloropr...	0.366	0.312	0.325	0.367	0.328	0.376	0.360	0.328	0.345	7.06
46) T	Bromodichlorom...	0.357	0.318	0.360	0.360	0.308	0.337	0.321	0.308	0.329	6.18
47) T	Trichloroethene	0.200	0.192	0.180	0.210	0.203	0.231	0.221	0.209	0.206	7.72
48) T	1,4-Dioxane	0.188	0.979	0.938	1.067	0.953	1.050	1.000	0.928	1.013	8.57
49) T	2,2,4-Trimethyl...	0.323	0.238	0.221	0.254	0.239	0.269	0.255	0.238	0.255	14.21
50) T	Methyl Methacry...	0.315	0.336	0.314	0.383	0.374	0.448	0.436	0.402	0.376	12.36
51) T	n-Heptane	0.150	0.195	0.201	0.229	0.218	0.206	0.206	0.200	0.200	13.59
52) T	cis-1,3-Dichlo...	0.234	0.238	0.283	0.324	0.341	0.396	0.381	0.364	0.320	19.58
53) T	4-Methyl-2-pen...	0.297	0.262	0.254	0.290	0.269	0.286	0.270	0.254	0.273	5.97
54) T	trans-1,3-Dich...	0.297	0.262	0.254	0.290	0.269	0.286	0.270	0.254	0.273	
55) T	1,1,2-Trichlor...	0.297	0.262	0.254	0.290	0.269	0.286	0.270	0.254	0.273	
56) IR	Chlorobenzene-d5	(...)	(...)	(...)	(...)	(...)	(...)	(...)	(...)	(...)	2.57
57) S	Toluene-d8 (SS2)	2.441	2.382	2.385	2.355	2.340	2.492	2.501	2.459	2.419	9.74
58) T	Toluene	3.424	2.792	2.683	2.817	2.490	2.934	2.811	2.663	2.827	
59) T	2-Hexanone	0.719	0.668	0.647	0.786	0.849	1.068	1.019	0.962	0.888	17.79
60) T	Dibromochlorom...	0.682	0.673	0.657	0.705	0.698	0.783	0.755	0.734	0.717	5.43
61) T	1,2-Dibromoethane	0.880	0.903	0.831	0.920	0.721	0.694	0.784	0.745	0.721	0.710
62) T	n-Butyl Acetate	1.899	1.801	1.892	1.701	1.909	1.831	1.756	1.858	1.858	21.05
63) T	n-Octane	0.529	0.457	0.467	0.482	0.455	0.534	0.516	0.484	0.490	6.50
64) T	Tetrachloroethene	2.992	2.874	2.811	2.953	2.754	3.224	3.077	2.929	2.952	5.07
65) T	Chlorobenzene	2.496	2.263	2.112	2.397	2.204	2.599	2.470	2.372	2.364	6.86
66) T	Ethylbenzene	0.621	0.517	0.602	0.650	0.618	0.749	0.721	0.732	0.651	12.06
67) T	m- & p-Xylenes	1.757	1.547	1.623	1.834	1.715	2.089	1.984	1.814	1.814	10.38
68) T	Bromoform	2.609	2.267	2.306	2.602	2.256	2.711	2.513	2.583	2.481	7.19
69) T	Styrene	2.609	2.267	2.306	2.602	2.256	2.711	2.513	2.583	2.481	
70) T	o-Xylene	2.609	2.267	2.306	2.602	2.256	2.711	2.513	2.583	2.481	

Method	Path :	J:\MS09\Methods\	TO-15	(CASS TO-15/GC-MS)
Method	File :	R9071512.M	per SOP	VOA-TO15
Title				
71) T	n-Nonane	1.070	0.975	0.894 1.017 0.953 1.107 1.040 0.988 1.006
72) T	1,1,2,2-Tetrac...	1.118	1.098	1.066 1.168 1.081 1.262 1.208 1.178 1.147
73) S	BromoFluoroben...	1.109	1.067	1.115 1.087 1.101 1.109 1.072 1.125 1.098
74) T	Cumene	3.608	3.112	3.064 3.389 3.000 3.503 3.312 3.242 3.279
75) T	alpha-Pinene	1.527	1.524	1.399 1.528 1.440 1.710 1.625 1.586 1.542
76) T	n-Propylbenzene	3.922	3.682	3.532 3.952 3.621 4.200 4.022 3.732 3.833
77) T	3-Ethyltoluene	3.056	2.782	2.819 3.174 3.073 3.536 3.327 3.165 3.116
78) T	4-Ethyltoluene	3.107	2.810	2.738 2.940 2.777 3.233 3.183 3.169 2.995
79) T	1,3,5-Trimethyl...	2.238	2.286	2.280 2.552 2.358 2.764 2.667 2.598 2.468
80) T	alpha-Methylst...	1.269	1.197	1.240 1.387 1.349 1.620 1.573 1.557 1.399
81) T	2-Ethyltoluene	3.140	2.930	2.965 3.197 2.992 3.493 3.358 3.271 3.168
82) T	1,2,4-Trimethyl...	2.602	2.293	2.295 2.569 2.428 2.884 2.816 2.731 2.577
83) T	n-Decane	1.259	1.058	1.129 1.244 1.163 1.372 1.332 1.279 1.230
84) T	Benzyl Chloride	1.460	1.223	1.374 1.497 1.609 1.485 1.786 1.732 1.676 1.624
85) T	1,3-Dichlorobe...	1.729	1.477	1.497 1.543 1.741 2.449 2.423 2.408 1.828
86) T	1,4-Dichlorobe...	1.756	1.605	1.545 1.665 1.665 1.498 1.819 1.746 1.713 1.668
87) T	sec-Butylbenzene	3.402	3.244	3.181 3.484 3.293 3.872 3.759 3.510 3.468
88) T	4-Isopropyltol...	3.384	2.953	3.009 3.393 3.192 3.902 3.750 3.562 3.393 3.94
89) T	1,2,3-Trimethyl...	2.631	2.411	2.418 2.692 2.464 3.025 2.904 2.817 2.670
90) T	1,2-Dichlorobe...	1.745	1.475	1.452 1.619 1.459 1.767 1.689 1.650 1.607
91) T	d-Limonene	0.801	0.725	0.766 0.858 0.841 1.038 1.004 0.970 0.875
92) T	1,2-Dibromo-3-...	0.505	0.452	0.457 0.485 0.482 0.626 0.610 0.600 0.527
93) T	n-Undecane	1.160	1.066	1.059 1.171 1.160 1.408 1.337 1.281 1.205
94) T	1,2,4-Trichlor...	1.280	1.026	1.015 1.075 1.035 1.297 1.269 1.233 1.154
95) T	Naphthalene	5.158	3.256	3.309 3.775 3.752 4.609 4.572 4.070 4.063
96) T	n-Dodecane	1.291	0.944	0.991 1.090 1.151 1.393 1.367 1.305 1.192
97) T	Hexachlorobuta...	1.095	0.746	0.682 0.762 0.657 0.783 0.768 0.742 0.779
98) T	Cyclohexanone	0.785	0.666	0.639 0.687 0.708 0.855 0.824 0.808 0.746
99) T	tert-Butylbenzene	2.768	2.554	2.402 2.590 2.477 2.919 2.837 2.739 2.661
100) T	n-Butylbenzene	2.550	2.260	2.230 2.615 2.479 3.036 2.894 2.725 2.598

(#) = Out of Range



QC Certification

Columbia Analytical Services, Inc.
 2655 Park Center Drive, Suite A
 Simi Valley, CA 93065
 Ph. 805-526-7161
 Fax 805-526-7270

<u>Container IDs</u>	<u>Cleaned Date</u>	<u>Date Analyzed</u>	<u>QC Results</u>	<u>Comments</u>
AC00915*	6/22/12	6/26/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC00929	6/22/12	6/26/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01016	6/22/12	6/26/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01040	6/22/12	6/26/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01096	6/22/12	6/26/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01104	6/22/12	6/26/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01125	6/22/12	6/26/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01243	6/22/12	6/26/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01308*	7/5/12	7/9/12	Pass w/ Conditions	SIM
AC01462	6/22/12	6/26/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01645	6/22/12	6/26/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01783	6/22/12	6/26/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01808	6/22/12	6/26/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01881	6/22/12	6/26/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01893*	7/2/12	7/3/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AS00030	6/22/12	6/26/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
FCA00022	7/6/12	7/10/12		
FCA00084	7/6/12	7/10/12		
FCA00100	7/6/12	7/10/12		
FCA00120	7/6/12	7/10/12		
FCA00207	7/6/12	7/10/12		
FCA00311	7/6/12	7/10/12		
FCA00326	7/6/12	7/10/12		
FCA00347	7/6/12	7/10/12		
FCA00379	7/6/12	7/10/12		
FCA00381	7/6/12	7/10/12		
FCA00410	7/6/12	7/10/12		
FCA00478	7/6/12	7/10/12		

LABORATORY REPORT

August 1, 2013

Karen Mordock
CH2M Hill
1717 Arch Street, Suite 4400
Philadelphia, PA 19103

RE: Pfizer Ambient Air Monitoring / 431248.AM.FW

Dear Karen:

Your report number P1204389 has been amended for the samples submitted to our laboratory on October 25, 2012. The Privileged and Confidential water mark has been removed from all of the report pages. The revised pages have been indicated by the "Revised Page" footer located at the bottom right of the page.

All analyses were performed according to our laboratory's NELAP and DoD-ELAP-approved quality assurance program. The test results meet requirements of the current NELAP and DoD-ELAP standards, where applicable, and except as noted in the laboratory case narrative provided. For a specific list of NELAP and DoD-ELAP-accredited analytes, refer to the certifications section at www.caslab.com. Results are intended to be considered in their entirety and apply only to the samples analyzed and reported herein.

Columbia Analytical Services, Inc. dba ALS Environmental (ALS) is certified by the California Department of Health Services, NELAP Laboratory Certificate No. 02115CA; Arizona Department of Health Services, Certificate No. AZ0694; Florida Department of Health, NELAP Certification E871020; New Jersey Department of Environmental Protection, NELAP Laboratory Certification ID #CA009; New York State Department of Health, NELAP NY Lab ID No: 11221; Oregon Environmental Laboratory Accreditation Program, NELAP ID: CA200007; The American Industrial Hygiene Association, Laboratory #101661; United States Department of Defense Environmental Laboratory Accreditation Program (DoD-ELAP), Certificate No. L11-203; Pennsylvania Registration No. 68-03307; TX Commission of Environmental Quality, NELAP ID T104704413-12-3; Minnesota Department of Health, NELAP Certificate No. 362188; Washington State Department of Ecology, ELAP Lab ID: C946, State of Utah Department of Health, NELAP Certificate No. CA01527Z012-Z; Los Angeles Department of Building and Safety, Approval No: TA00001. Each of the certifications listed above have an explicit Scope of Accreditation that applies to specific matrices/methods/analytes; therefore, please contact me for information corresponding to a particular certification.

If you have any questions, please call me at (805) 526-7161.

Respectfully submitted,

ALS | Environmental



By Kelly Horiuchi at 1:24 pm, Aug 01, 2013

Kelly Horiuchi
Laboratory Director

Client: CH2M Hill Service Request No: P1204389
Project: Pfizer Ambient Air Monitoring / 431248.AM.FW

CASE NARRATIVE

The samples were received intact under chain of custody on October 25, 2012 and were stored in accordance with the analytical method requirements. Samples "PZAA-C3a-102412", "PZAA-C3b-102412", "PZAA-C3c-102412", and "PZAA-C3d-102412" were received with insufficient hold time remaining to complete the analysis within the recommended limit. The analysis was performed as soon as possible after receipt by the laboratory and the data flagged to indicate the holding time exceedance. Please refer to the sample acceptance check form for additional information. The results reported herein are applicable only to the condition of the samples at the time of sample receipt.

Sulfur Analysis

The samples were analyzed for twenty sulfur compounds per ASTM D 5504-08 using a gas chromatograph equipped with a sulfur chemiluminescence detector (SCD). All compounds with the exception of hydrogen sulfide and carbonyl sulfide are quantitated against the initial calibration curve for methyl mercaptan.

The analysis of "PZAA-C1a-102412", "PZAA-C1c-102412", "PZAA-C1d-102412", "PZAA-C2a-102412", "PZAA-C2b-102412", "PZAA-C2c-102412", "PZAA-C2d-102412", "PZAA-C3a-102412", "PZAA-C3b-102412", "PZAA-C3c-102412" and "PZAA-C3d-102412" were performed past the holding time. The results have been flagged accordingly.

The results of analyses are given in the attached laboratory report. All results are intended to be considered in their entirety, and Columbia Analytical Services, Inc. dba ALS Environmental (ALS) is not responsible for utilization of less than the complete report.

Use of Columbia Analytical Services, Inc. dba ALS Environmental (ALS)'s Name. Client shall not use ALS's name or trademark in any marketing or reporting materials, press releases or in any other manner ("Materials") whatsoever and shall not attribute to ALS any test result, tolerance or specification derived from ALS's data ("Attribution") without ALS's prior written consent, which may be withheld by ALS for any reason in its sole discretion. To request ALS's consent, Client shall provide copies of the proposed Materials or Attribution and describe in writing Client's proposed use of such Materials or Attribution. If ALS has not provided written approval of the Materials or Attribution within ten (10) days of receipt from Client, Client's request to use ALS's name or trademark in any Materials or Attribution shall be deemed denied. ALS may, in its discretion, reasonably charge Client for its time in reviewing Materials or Attribution requests. Client acknowledges and agrees that the unauthorized use of ALS's name or trademark may cause ALS to incur irreparable harm for which the recovery of money damages will be inadequate. Accordingly, Client acknowledges and agrees that a violation shall justify preliminary injunctive relief. For questions contact the laboratory.

DETAIL SUMMARY REPORT

Client: CH2M Hill Service Request: P1204389
 Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

 Date Received: 10/25/2012
 Time Received: 10:15

ASTM D5504-08 - Sulfur Bag

Client Sample ID	Lab Code	Matrix	Date Collected	Time Collected	
PZAA-C1a-102412	P1204389-001	Air	10/24/2012	10:49	X
PZAA-C1b-102412	P1204389-002	Air	10/24/2012	10:43	X
PZAA-C1c-102412	P1204389-003	Air	10/24/2012	11:02	X
PZAA-C1d-102412	P1204389-004	Air	10/24/2012	10:52	X
PZAA-C2a-102412	P1204389-005	Air	10/24/2012	11:19	X
PZAA-C2b-102412	P1204389-006	Air	10/24/2012	11:14	X
PZAA-C2c-102412	P1204389-007	Air	10/24/2012	11:22	X
PZAA-C2d-102412	P1204389-008	Air	10/24/2012	11:34	X
PZAA-C3a-102412	P1204389-009	Air	10/24/2012	10:21	X
PZAA-C3b-102412	P1204389-010	Air	10/24/2012	10:16	X
PZAA-C3c-102412	P1204389-011	Air	10/24/2012	10:24	X
PZAA-C3d-102412	P1204389-012	Air	10/24/2012	10:31	X

Air - Chain of Custody Record & Analytical Service Request

Page 1 of 1

Requested Turnaround Time in Business Days (Surcharges) please circle					CAS Project No.
1 Day (100%) 2 Day (75%) 3 Day (50%) 4 Day (35%) 5 Day (25%) 10 Day-Standard					<u>91204389</u>

Company Name & Address (Reporting Information)

CH2M HILL
177 Arch Street Suite 400
Philadelphia PA 19103

Project Manager

Karen Mordock

Phone

267.1085.0198

Fax

215.640.9212

Email Address for Result Reporting

Karen.Mordock@ch2m.com

Leslie Baecher

Sampler (Print & Sign)

Client Sample ID

Laboratory ID Number

Date Collected

Time Collected

Canister ID
(Bar code # -
AC, SC, etc.)

Flow Controller ID
(Bar code # -
FC #)

Start Pressure
"Hg

End Pressure
"Hg/psig

Canister
Sample Volume

ASTM D5504
Reduced Sulfur
Compounds + H₂S

Tedlar Bag

PZAA-Cla-102412

①

10/24/12

1049

1043

1102

1052

1119

1114

1122

1134

1021

1016

1024

1031

↓

XX

X

Tier III (Results + QC & Calibration Summaries) _____

Tier IV (Data Validation Package) 10% Surcharge _____

EDD required Yes / No

Type: _____

Project Requirements
(MRLs, QAPP)

Report Tier Levels - please select

Tier I - Results (Default if not specified) _____ Pen SOW

Tier II (Results + QC Summaries) _____

Relinquished by: (Signature)

Jay

Date: 10/24/12 Time: 13:00 Received by: Signature: D. G. Hall Time: 10:15

Received by: (Signature)

Project Requirements
(MRLs, QAPP)

Relinquished by: (Signature)

Jay

Date: Time: Received by: (Signature)

Project Requirements
(MRLs, QAPP)

Sample Acceptance Check Form

Client: CH2M Hill

Work order: P1204389

Project: Pfizer Ambient Air Monitoring / 431248.AM.FW

Sample(s) received on: 10/25/12

Date opened: 10/25/12

by: MZAMORA

Note: This form is used for all samples received by CAS. The use of this form for custody seals is strictly meant to indicate presence/absence and not as an indication of compliance or nonconformity. Thermal preservation and pH will only be evaluated either at the request of the client and/or as required by the method/SOP.

Yes **No** **N/A**

- 1 Were **sample containers** properly marked with client sample ID?
 - 2 Container(s) **supplied by CAS?**
 - 3 Did **sample containers** arrive in good condition?
 - 4 Were **chain-of-custody** papers used and filled out?
 - 5 Did **sample container labels** and/or tags agree with custody papers?
 - 6 Was **sample volume** received adequate for analysis?
 - 7 Are samples within specified holding times?
 - 8 Was proper **temperature** (thermal preservation) of cooler at receipt adhered to?

 - 9 Was a **trip blank** received?
 - 10 Were **custody seals** on outside of cooler/Box?
- Location of seal(s)? Top of box, covering opening. Sealing Lid?
- Were signature and date included?
- Were seals intact?
- Were custody seals on outside of sample container?
- Location of seal(s)? Top of box, covering opening. Sealing Lid?
- Were signature and date included?
- Were seals intact?
- 11 Do containers have appropriate **preservation**, according to method/SOP or Client specified information?
 - Is there a client indication that the submitted samples are **pH** preserved?
 - Were **VOA vials** checked for presence/absence of air bubbles?
 - Does the client/method/SOP require that the analyst check the sample pH and if necessary alter it?
 - 12 **Tubes:** Are the tubes capped and intact?
 - Do they contain moisture?
 - 13 **Badges:** Are the badges properly capped and intact?
 - Are dual bed badges separated and individually capped and intact?

Lab Sample ID	Container Description	Required pH *	Received pH	Adjusted pH	VOA Headspace (Presence/Absence)	Receipt / Preservation Comments
P1204389-001.01	5.0 L Tedlar Bag					
P1204389-002.01	5.0 L Tedlar Bag					
P1204389-003.01	5.0 L Tedlar Bag					
P1204389-004.01	5.0 L Tedlar Bag					
P1204389-005.01	5.0 L Tedlar Bag					
P1204389-006.01	5.0 L Tedlar Bag					
P1204389-007.01	5.0 L Tedlar Bag					
P1204389-008.01	5.0 L Tedlar Bag					

Explain any discrepancies: (include lab sample ID numbers): _____

"PZA-3c-102412" and "PZA-3d-102412" on the CoC were logged in as "PZA-C3c-102412" and "PZA-C3d-102412" resp.

Samples -009 thru -012 hold times expired in SMO during login.

RSK - MEEPP, HCL (pH<2); RSK - CO2, (pH 5-8); Sulfur (pH>4)

Sample Acceptance Check Form

Client: CH2M Hill

Work order: P1204389

Project: Pfizer Ambient Air Monitoring / 431248.AM.FW

Sample(s) received on: 10/25/12

Date opened: 10/25/12

by: MZAMORA

Explain any discrepancies: (include lab sample ID numbers):

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C1a-102412

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1204389

CAS Sample ID: P1204389-001

Test Code: ASTM D 5504-08
Instrument ID: Agilent 6890A/GC13/SCD
Analyst: Wade Henton
Sampling Media: 5.0 L Tedlar Bag
Test Notes: **H1**

Date Collected: 10/24/12
Time Collected: 10:49
Date Received: 10/25/12
Date Analyzed: 10/25/12
Time Analyzed: 14:22
Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

H1 = Sample analysis performed past holding time. See case narrative.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C1b-102412

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1204389

CAS Sample ID: P1204389-002

Test Code: ASTM D 5504-08
Instrument ID: Agilent 6890A/GC13/SCD
Analyst: Wade Henton
Sampling Media: 5.0 L Tedlar Bag
Test Notes:

Date Collected: 10/24/12
Time Collected: 10:43
Date Received: 10/25/12
Date Analyzed: 10/25/12
Time Analyzed: 10:37
Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C1c-102412

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1204389

CAS Sample ID: P1204389-003

Test Code: ASTM D 5504-08
Instrument ID: Agilent 6890A/GC13/SCD
Analyst: Wade Henton
Sampling Media: 5.0 L Tedlar Bag
Test Notes: **H1**

Date Collected: 10/24/12
Time Collected: 11:02
Date Received: 10/25/12
Date Analyzed: 10/25/12
Time Analyzed: 14:40
Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

H1 = Sample analysis performed past holding time. See case narrative.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C1d-102412

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1204389

CAS Sample ID: P1204389-004

Test Code: ASTM D 5504-08
Instrument ID: Agilent 6890A/GC13/SCD
Analyst: Wade Henton
Sampling Media: 5.0 L Tedlar Bag
Test Notes: **H1**

Date Collected: 10/24/12
Time Collected: 10:52
Date Received: 10/25/12
Date Analyzed: 10/25/12
Time Analyzed: 14:57
Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

H1 = Sample analysis performed past holding time. See case narrative.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C2a-102412

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1204389

CAS Sample ID: P1204389-005

Test Code: ASTM D 5504-08
Instrument ID: Agilent 6890A/GC13/SCD
Analyst: Wade Henton
Sampling Media: 5.0 L Tedlar Bag
Test Notes: **H1**

Date Collected: 10/24/12
Time Collected: 11:19
Date Received: 10/25/12
Date Analyzed: 10/25/12
Time Analyzed: 15:29
Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

H1 = Sample analysis performed past holding time. See case narrative.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C2b-102412

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1204389

CAS Sample ID: P1204389-006

Test Code: ASTM D 5504-08
Instrument ID: Agilent 6890A/GC13/SCD
Analyst: Wade Henton
Sampling Media: 5.0 L Tedlar Bag
Test Notes: **H1**

Date Collected: 10/24/12
Time Collected: 11:14
Date Received: 10/25/12
Date Analyzed: 10/25/12
Time Analyzed: 15:49
Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

H1 = Sample analysis performed past holding time. See case narrative.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C2c-102412

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1204389

CAS Sample ID: P1204389-007

Test Code: ASTM D 5504-08
Instrument ID: Agilent 6890A/GC13/SCD
Analyst: Wade Henton
Sampling Media: 5.0 L Tedlar Bag
Test Notes: **H1**

Date Collected: 10/24/12
Time Collected: 11:22
Date Received: 10/25/12
Date Analyzed: 10/25/12
Time Analyzed: 16:09
Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

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H1 = Sample analysis performed past holding time. See case narrative.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C2d-102412

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1204389

CAS Sample ID: P1204389-008

Test Code: ASTM D 5504-08
 Instrument ID: Agilent 6890A/GC13/SCD
 Analyst: Wade Henton
 Sampling Media: 5.0 L Tedlar Bag
 Test Notes: **H1**

Date Collected: 10/24/12
 Time Collected: 11:34
 Date Received: 10/25/12
 Date Analyzed: 10/25/12
 Time Analyzed: 16:27
 Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

H1 = Sample analysis performed past holding time. See case narrative.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C3a-102412

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1204389

CAS Sample ID: P1204389-009

Test Code: ASTM D 5504-08
Instrument ID: Agilent 6890A/GC13/SCD
Analyst: Wade Henton
Sampling Media: 5.0 L Tedlar Bag
Test Notes: **H1**

Date Collected: 10/24/12
Time Collected: 10:21
Date Received: 10/25/12
Date Analyzed: 10/25/12
Time Analyzed: 17:02
Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

H1 = Sample analysis performed past holding time. See case narrative.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C3b-102412

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1204389

CAS Sample ID: P1204389-010

Test Code: ASTM D 5504-08
Instrument ID: Agilent 6890A/GC13/SCD
Analyst: Wade Henton
Sampling Media: 5.0 L Tedlar Bag
Test Notes: **H1**

Date Collected: 10/24/12
Time Collected: 10:16
Date Received: 10/25/12
Date Analyzed: 10/25/12
Time Analyzed: 17:22
Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

H1 = Sample analysis performed past holding time. See case narrative.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C3c-102412

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1204389

CAS Sample ID: P1204389-011

Test Code: ASTM D 5504-08
Instrument ID: Agilent 6890A/GC13/SCD
Analyst: Wade Henton
Sampling Media: 5.0 L Tedlar Bag
Test Notes: **H1**

Date Collected: 10/24/12
Time Collected: 10:24
Date Received: 10/25/12
Date Analyzed: 10/25/12
Time Analyzed: 17:42
Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

H1 = Sample analysis performed past holding time. See case narrative.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C3d-102412

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1204389

CAS Sample ID: P1204389-012

Test Code: ASTM D 5504-08
Instrument ID: Agilent 6890A/GC13/SCD
Analyst: Wade Henton
Sampling Media: 5.0 L Tedlar Bag
Test Notes: **H1**

Date Collected: 10/24/12
Time Collected: 10:31
Date Received: 10/25/12
Date Analyzed: 10/25/12
Time Analyzed: 17:59
Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

H1 = Sample analysis performed past holding time. See case narrative.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: Method Blank

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1204389

CAS Sample ID: P121025-MB

Test Code: ASTM D 5504-08
Instrument ID: Agilent 6890A/GC13/SCD
Analyst: Wade Henton
Sampling Media: 5.0 L Tedlar Bag
Test Notes:

Date Collected: NA
Time Collected: NA
Date Received: NA
Date Analyzed: 10/25/12
Time Analyzed: 08:50
Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

LABORATORY CONTROL SAMPLE SUMMARY

Page 1 of 1

Client: CH2M Hill

Client Sample ID: Lab Control Sample

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1204389

CAS Sample ID: P121025-LCS

Test Code: ASTM D 5504-08

Date Collected: NA

Instrument ID: Agilent 6890A/GC13/SCD

Date Received: NA

Analyst: Wade Henton

Date Analyzed: 10/25/12

Sampling Media: 5.0 L Tedlar Bag

Volume(s) Analyzed: NA ml(s)

Test Notes:

CAS #	Compound	Spike Amount ppbV	Result ppbV	% Recovery	CAS Acceptance Limits	Data Qualifier
7783-06-4	Hydrogen Sulfide	2,380	2,550	107	51-141	
463-58-1	Carbonyl Sulfide	2,470	2,100	85	63-147	
74-93-1	Methyl Mercaptan	2,360	3,220	136	54-156	

Method Path : J:\GC13\METHODS\
 Method File : GC13071212A.M
 Title : 20 Sulfurs Initial Calibration
 Last Update : Fri Jul 13 12:44:45 2012
 Response Via : Initial Calibration

Calibration Files

1	=07121206.D	2	=07121212.D	3	=07121208.D
4	=07121209.D	5	=07121210.D	6	=07121211.D

	Compound	1	2	3	4	5	6	Avg	%RSD
1) Z	Hydrogen_Sulfide	0.837	0.874	0.769	0.968	0.867	1.165	0.913	E4 15.22
2) W	Carbonyl_Sulfide	1.191	1.036	1.093	1.177	1.034	1.251	1.130	E4 7.88
3) T	Methyl_Mercaptan	0.981	0.936	0.911	1.184	1.021	1.279	1.052	E4 14.00
4) T	Ethyl_Mercaptan	0.981	0.936	0.911	1.184	1.021	1.279	1.052	E4 14.00
5) T	Dimethyl_Sulfide	0.981	0.936	0.911	1.184	1.021	1.279	1.052	E4 14.00
6) T	Carbon_Disulfide	1.961	1.872	1.821	2.369	2.043	2.558	2.104	E4 14.00
7) T	2-Propyl_Merc...	0.981	0.936	0.911	1.184	1.021	1.279	1.052	E4 14.00
8) T	t-Butyl_Merca...	0.981	0.936	0.911	1.184	1.021	1.279	1.052	E4 14.00
9) T	Propyl_Mercaptan	0.981	0.936	0.911	1.184	1.021	1.279	1.052	E4 14.00
10) T	Ethyl_Methyl_...	0.981	0.936	0.911	1.184	1.021	1.279	1.052	E4 14.00
11) T	Thiophene	0.981	0.936	0.911	1.184	1.021	1.279	1.052	E4 14.00
12) T	i-Butyl_Merca...	0.981	0.936	0.911	1.184	1.021	1.279	1.052	E4 14.00
13) T	Diethyl_Sulfide	0.981	0.936	0.911	1.184	1.021	1.279	1.052	E4 14.00
14) T	n-Butyl_Merca...	0.981	0.936	0.911	1.184	1.021	1.279	1.052	E4 14.00
15) T	Dimethyl_Disu...	1.961	1.872	1.821	2.369	2.043	2.558	2.104	E4 14.00
16) T	2-Methylthiop...	0.981	0.936	0.911	1.184	1.021	1.279	1.052	E4 14.00
17) T	3-Methylthiop...	0.981	0.936	0.911	1.184	1.021	1.279	1.052	E4 14.00
18) T	Tetrahydrothi...	0.981	0.936	0.911	1.184	1.021	1.279	1.052	E4 14.00
19) T	2,5-Dimethylt...	0.981	0.936	0.911	1.184	1.021	1.279	1.052	E4 14.00
20) T	2-Ethylthiophene	0.981	0.936	0.911	1.184	1.021	1.279	1.052	E4 14.00
21) T	Diethyl_Disul...	1.961	1.872	1.821	2.369	2.043	2.558	2.104	E4 14.00
22) T	Dimethyltrisu...	2.942	2.808	2.732	3.553	3.064	3.837	3.156	E4 14.00

(#= Out of Range

GC13071212A.M Fri Jul 13 12:45:41 2012

COLUMBIA ANALYTICAL INC.**REPORT SUMMARY**

Method : 20 Sulfurs Initial Calibration
 Client & Job# : CH2MHill P1204389
 Analyst : MC

Printed : 10/29/12
 Instrument : GC#13, SCD#13
 Date Acquired : 10/25/12

SAMPLE RESULT SUMMARIES (ppb)

Compounds	MDL	RL	ppbv	% Diff	ppbv	ppbv	ppbv	ppbv	ppbv	ppbv	ppbv	ppbv	ppbv
Sample Information :			std 2000ppb s27- 10221206	RT/CS 2500ppb s27- 11071103	% R	mb 1ml	4389-001 1ml	4389-002 1ml	4389-003 1ml	4389-004 1ml	4389-005 1ml	4389-006 1ml	4389-007 1ml
Injection Volume (mL):	1.0	1.0	0.200			1.000	1.0	1.0	1.0	1.0	1.0	1.0	1.0
Dilution:			1			1	1.0	1.0	1.0	1.0	1.0	1.0	1.0
P1:			1.0			1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
P2:			1.0			1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PIP DF:	1.00	1.00				1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hydrogen_Sulfide	1.8	5.0	10638.3	5.5%	2553.0	107.5%	ND	ND	ND	ND	ND	ND	ND
Carbonyl_Sulfide	5.0	5.0	8732.90	14.6%	2100.9	85.1%	ND	ND	ND	ND	ND	ND	ND
Methyl_Mercaptan	2.4	5.0	8543.70	9.5%	3221.0	136.5%	ND	ND	ND	ND	ND	ND	ND
Ethyl_Mercaptan	2.4	5.0					Spike	ND	ND	ND	ND	ND	ND
Dimethyl_Sulfide	2.4	5.0					Amount	ND	ND	ND	ND	ND	ND
Carbon_Disulfide	2.5	2.5					Hydrogen_Sulfide	2375.0	ND	ND	ND	ND	ND
2-Propyl_Mercaptan	2.4	5.0					Carbonyl_Sulfide	2470.0	ND	ND	ND	ND	ND
t-Butyl_Mercaptan(2-Me-2-	2.4	5.0					Methyl Mercaptan	2360.0	ND	ND	ND	ND	ND
Propyl_Mercaptan	2.4	5.0							ND	ND	ND	ND	ND
Ethyl_Methyl_Sulfide	2.4	5.0							ND	ND	ND	ND	ND
Thiophene	2.4	5.0							ND	ND	ND	ND	ND
t-Butyl_Mercaptan(2-Me-1-	2.4	5.0							ND	ND	ND	ND	ND
Diethyl_Sulfide	2.4	5.0							ND	ND	ND	ND	ND
n-Butyl_Mercaptan	2.4	5.0							ND	ND	ND	ND	ND
Dimethyl_Disulfide	1.20	2.5							ND	ND	ND	ND	ND
2-Methyl_Thiophene	2.4	5.0							ND	ND	ND	ND	ND
3-Methyl_Thiophene	2.4	5.0							ND	ND	ND	ND	ND
Tetrahydrothiophene	2.4	5.0							ND	ND	ND	ND	ND
2,5-Dimethyl_Thiophene	2.4	5.0							ND	ND	ND	ND	ND
2-Ethyl_Thiophene	2.4	5.0							ND	ND	ND	ND	ND
Diethyl_Disulfide	1.20	2.5							ND	ND	ND	ND	ND
Methylirritsulfide		1.20							ND	ND	ND	ND	ND

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j = estimated concentration. Concentration greater than MDL but below RL.

Revised Page

COLUMBIA ANALYTICAL INC.**REPORT SUMMARY**

Method : 20 Sulfurs Initial Calibration
 Client & Job# : CH2MHill P1204389
 Analyst : MC

Compounds	MDL	ppbv	ppbv	ppbv	ppbv	ppbv	ppbv	ppbv	ppbv	% Diff
Sample Information :	ppbv	4389-009 1ml	4389-010 1ml	4389-011 1ml	4389-012 1ml					
Injection Volume (mL):	1.0	1.0	1.0	1.0	1.0					
Dilution:	1.0	1.0	1.0	1.0	1.0					
Pi:	1.00	1.00	1.00	1.00	1.00					
Pf:	1.00	1.00	1.00	1.00	1.00					
PIPf DF:	1.00	1.00	1.00	1.00	1.00					
Hydrogen_Sulfide	1.8	ND	ND	ND	ND					
Carbonyl_Sulfide	5.0	ND	ND	ND	ND					
Methyl_Mercaptan	2.4	ND	ND	ND	ND					
Ethyl_Mercaptan	2.4	ND	ND	ND	ND					
Dimethyl_Sulfide	2.4	ND	ND	ND	ND					
Carbon_Disulfide	2.5	ND	ND	ND	ND					
2-Propyl_Mercaptan	2.4	ND	ND	ND	ND					
t-Butyl_Mercaptan(2-Me-2-	2.4	ND	ND	ND	ND					
Propyl_Mercaptan	2.4	ND	ND	ND	ND					
Ethyl_Methyl_Sulfide	2.4	ND	ND	ND	ND					
Thiophene	2.4	ND	ND	ND	ND					
i-Butyl_Mercaptan(2-Me-1-	2.4	ND	ND	ND	ND					
Diethyl_Sulfide	2.4	ND	ND	ND	ND					
n-Butyl_Mercaptan	2.4	ND	ND	ND	ND					
Dimethyl_Disulfide	1.20	ND	ND	ND	ND					
2-Methyl_Thiophene	2.4	ND	ND	ND	ND					
3-Methyl_Thiophene	2.4	ND	ND	ND	ND					
Tetrahydrothiophene	2.4	ND	ND	ND	ND					
2,5-Dimethyl_Thiophene	2.4	ND	ND	ND	ND					
2-Ethyl_Thiophene	2.4	ND	ND	ND	ND					
Diethyl_Disulfide	1.20	ND	ND	ND	ND					
Methyltrisulfide	1.20	ND	ND	ND	ND					

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j = estimated concentration. Conc

Revised Page

LABORATORY REPORT

August 1, 2013

Karen Mordock
CH2M Hill
1717 Arch Street, Suite 4400
Philadelphia, PA 19103

RE: Pfizer - Bridgewater NJ

Dear Karen:

Your report number P1204414 has been amended for the samples submitted to our laboratory on October 26, 2012. The Privileged and Confidential water mark has been removed from all of the report pages. The revised pages have been indicated by the "Revised Page" footer located at the bottom right of the page.

All analyses were performed according to our laboratory's NELAP and DoD-ELAP-approved quality assurance program. The test results meet requirements of the current NELAP and DoD-ELAP standards, where applicable, and except as noted in the laboratory case narrative provided. For a specific list of NELAP and DoD-ELAP-accredited analytes, refer to the certifications section at www.caslab.com. Results are intended to be considered in their entirety and apply only to the samples analyzed and reported herein.

Columbia Analytical Services, Inc. dba ALS Environmental (ALS) is certified by the California Department of Health Services, NELAP Laboratory Certificate No. 02115CA; Arizona Department of Health Services, Certificate No. AZ0694; Florida Department of Health, NELAP Certification E871020; New Jersey Department of Environmental Protection, NELAP Laboratory Certification ID #CA009; New York State Department of Health, NELAP NY Lab ID No: 11221; Oregon Environmental Laboratory Accreditation Program, NELAP ID: CA200007; The American Industrial Hygiene Association, Laboratory #101661; United States Department of Defense Environmental Laboratory Accreditation Program (DoD-ELAP), Certificate No. L11-203; Pennsylvania Registration No. 68-03307; TX Commission of Environmental Quality, NELAP ID T104704413-12-3; Minnesota Department of Health, NELAP Certificate No. 362188; Washington State Department of Ecology, ELAP Lab ID: C946, State of Utah Department of Health, NELAP Certificate No. CA01527Z012-Z; Los Angeles Department of Building and Safety, Approval No: TA00001. Each of the certifications listed above have an explicit Scope of Accreditation that applies to specific matrices/methods/analytes; therefore, please contact me for information corresponding to a particular certification.

If you have any questions, please call me at (805) 526-7161.

Respectfully submitted,

ALS | Environmental



By Kelly Horiuchi at 1:26 pm, Aug 01, 2013

Kelly Horiuchi
Laboratory Director

Client: CH2M Hill
Project: Pfizer - Bridgewater NJ

Service Request No: P1204414

CASE NARRATIVE

The sample(s) were received intact under chain of custody on October 26, 2012 and were stored in accordance with the analytical method requirements. Please refer to the sample acceptance check form for additional information. The results reported herein are applicable only to the condition of the sample(s) at the time of sample receipt.

Aldehyde Analysis

The DNPH silica gel tube samples were analyzed for aldehydes according to EPA Method TO-11A using high performance liquid chromatography (HPLC).

Sample labeled as "PZAA-C3-102412-D" (-007) was received wet. Samples labeled as "PZAA-C1-102412" (-002), "PZAA-C2-102412" (-004), and "PZAA-C-102412" (-006) were received with hardened silica cemented together indicating that they had been wet at one point and had dried.

Polynuclear Aromatic Hydrocarbon Analysis

The low volume PUF/XAD-2 samples were analyzed for polynuclear aromatic hydrocarbons (PAHs). The extracts were analyzed according to the methodology outlined in EPA Method TO-13A using combined gas chromatography/mass spectrometry (GC/MS). However, the method was modified for the use of the low volume PUF/XAD-2 sample collection materials.

The lower control criterion was exceeded for naphthalene and acenaphthylene in the Duplicate Laboratory Control Sample (DLCS) analyzed on November 1, 2012. The Laboratory Control Sample (LCS) was analyzed and the recovery for the analytes in question meets the laboratory generated acceptance limits. Because the DLCS was biased low, relative percent difference (RPD) also did not meet for naphthalene, acenaphthene and fluorene. The surrogate fluorene-d10 was outside control criteria for the sample labeled as "PZAA-C2-102412". An internal nonconformance corrective action has been generated to investigate and discover the root cause for the low recoveries.

Client: CH2M Hill
Project: Pfizer - Bridgewater NJ

Service Request No: P1204414

NELAC requirements for compliance with EPA TO-13A state a duplicate sample must be analyzed. However, this is dependent upon the client submitting a secondary sample for extraction and analysis. Sample extraction was performed at the laboratory's off-site extraction facility located at 2360 Shasta Way, Suite G, Simi Valley, CA 93065.

The results of analyses are given in the attached laboratory report. All results are intended to be considered in their entirety, and Columbia Analytical Services, Inc. dba ALS Environmental (ALS) is not responsible for utilization of less than the complete report.

Use of Columbia Analytical Services, Inc. dba ALS Environmental (ALS)'s Name. Client shall not use ALS's name or trademark in any marketing or reporting materials, press releases or in any other manner ("Materials") whatsoever and shall not attribute to ALS any test result, tolerance or specification derived from ALS's data ("Attribution") without ALS's prior written consent, which may be withheld by ALS for any reason in its sole discretion. To request ALS's consent, Client shall provide copies of the proposed Materials or Attribution and describe in writing Client's proposed use of such Materials or Attribution. If ALS has not provided written approval of the Materials or Attribution within ten (10) days of receipt from Client, Client's request to use ALS's name or trademark in any Materials or Attribution shall be deemed denied. ALS may, in its discretion, reasonably charge Client for its time in reviewing Materials or Attribution requests. Client acknowledges and agrees that the unauthorized use of ALS's name or trademark may cause ALS to incur irreparable harm for which the recovery of money damages will be inadequate. Accordingly, Client acknowledges and agrees that a violation shall justify preliminary injunctive relief. For questions contact the laboratory.

DETAIL SUMMARY REPORT

Client: CH2M Hill
 Project ID: Pfizer - Bridgewater NJ

Date Received: 10/26/2012
 Time Received: 10:15

Service Request: P1204414

TO-13A Modified - PAH SIM Low Vol	TO-11A - Carbonyls	None - Misc Out 1
-----------------------------------	--------------------	-------------------

Client Sample ID	Lab Code	Matrix	Date Collected	Time Collected	
PZAA-C1-102412	P1204414-001	Air	10/24/2012	17:20	X
PZAA-C1-102412	P1204414-002	Air	10/24/2012	17:20	X
PZAA-C2-102412	P1204414-003	Air	10/24/2012	17:30	X
PZAA-C2-102412	P1204414-004	Air	10/24/2012	17:30	X
PZAA-C3-102412	P1204414-005	Air	10/24/2012	17:05	X
PZAA-C3-102412	P1204414-006	Air	10/24/2012	17:05	X
PZAA-C3-102412-D	P1204414-007	Air	10/24/2012	17:05	X



ANALYTICAL REQUEST FORM

PN24414

 REGULAR Status RUSH Status Required - ADDITIONAL CHARGE

RESULTS REQUIRED BY _____

DATE

CONTACT ALS LABORATORY GROUP PRIOR TO SENDING SAMPLES

Date 10/24/12 Purchase Order No. _____

Billing Address (if different) _____

Company Name CH2M HillAddress 1717 Arch Street Ste 4400
Philadelphia PA 19103

City _____ State _____ Zip _____

Person to Contact Karen Mordock

Quote No. _____

Email Address Karen.mordock@chzm.comSampling Site Pfizer Bridgewater NJTelephone (267) 685-0198Date/Time of Collection 10/24/12Fax Telephone (215) 640-9212

All Samples ran for 24 hrs.
*Time Collected in Sample Volumn
column.*

Laboratory Use Only	Client Sample Number	Media Type	Sample Volume * (Liters) *	ANALYSES REQUESTED - Use Method Number if Known
①	PZAA-C1-102412	Air	1720	TO-13A(PAHs)-low Volume - PUF/XAD Tube
②	PZAA-C1-102412	Air	1720	TO-11A(Aldehydes) Sorbent tube
③	PZAA-C2-102412	Air	1730	TO-13A(PAHs)-Low Volume - PUF/XAD TUBE
④	PZAA-C2-102412	Air	1730	TO-11A(Aldehydes) Sorbent tube
⑤	PZAA-C3-102412	Air	1705	TO-13A(PAHs)-Low Volume - PUF/XAD TUBE
⑥	PZAA-C3-102412	Air	1705	TO-11A(Aldehydes) Sorbent tube
⑦	PZAA-C3-102412-D	Air	1705	TO-11A(Aldehydes) Sorbent tube
⑧	PZAA-C3-102412	Air Particulate	1545	PM10 (Particulate) -47mm glass fiber filter

Failure to complete all portions of this form may delay analysis. Please fill in this form **LEGIBLY**.

CHAIN OF CUSTODY

Relinquished by: (Signature) <i>Christi Baechler</i>	Date / Time 10/25/12 14:00	Received by: (Signature) <i>ULH/Clellene</i>	Date / Time 10/26/12 10:15
Relinquished by: (Signature)	Date / Time	Received by: (Signature)	Date / Time

Sample Acceptance Check Form

 Client: CH2M Hill

 Work order: P1204414

 Project: Pfizer - Bridgewater NJ

 Sample(s) received on: 10/26/12

 Date opened: 10/26/12

 by: MZAMORA

Note: This form is used for all samples received by CAS. The use of this form for custody seals is strictly meant to indicate presence/absence and not as an indication of compliance or nonconformity. Thermal preservation and pH will only be evaluated either at the request of the client and/or as required by the method/SOP.

		Yes	No	N/A
1	Were sample containers properly marked with client sample ID?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
2	Container(s) supplied by CAS ?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
3	Did sample containers arrive in good condition?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
4	Were chain-of-custody papers used and filled out?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
5	Did sample container labels and/or tags agree with custody papers?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
6	Was sample volume received adequate for analysis?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7	Are samples within specified holding times?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
8	Was proper temperature (thermal preservation) of cooler at receipt adhered to? Cooler Temperature: 6° C Blank Temperature: ° C	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Gel Packs				
9	Was a blank received?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
10	Were custody seals on outside of cooler/Box?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
Location of seal(s)? _____ Sealing Lid? <input type="checkbox"/> <input type="checkbox"/> <input checked="" type="checkbox"/>				
Were signature and date included? <input type="checkbox"/> <input type="checkbox"/> <input checked="" type="checkbox"/>				
Were seals intact? <input type="checkbox"/> <input type="checkbox"/> <input checked="" type="checkbox"/>				
Were custody seals on outside of sample container? <input type="checkbox"/> <input checked="" type="checkbox"/> <input type="checkbox"/>				
Location of seal(s)? _____ Sealing Lid? <input type="checkbox"/> <input type="checkbox"/> <input checked="" type="checkbox"/>				
Were signature and date included? <input type="checkbox"/> <input type="checkbox"/> <input checked="" type="checkbox"/>				
Were seals intact? <input type="checkbox"/> <input type="checkbox"/> <input checked="" type="checkbox"/>				
11	Do containers have appropriate preservation , according to method/SOP or Client specified information?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
Is there a client indication that the submitted samples are pH preserved? <input type="checkbox"/> <input type="checkbox"/> <input checked="" type="checkbox"/>				
Were VOA vials checked for presence/absence of air bubbles? <input type="checkbox"/> <input type="checkbox"/> <input checked="" type="checkbox"/>				
Does the client/method/SOP require that the analyst check the sample pH and if necessary alter it? <input type="checkbox"/> <input type="checkbox"/> <input checked="" type="checkbox"/>				
12	Tubes: Are the tubes capped and intact?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Do they contain moisture? <input type="checkbox"/> <input checked="" type="checkbox"/> <input type="checkbox"/>				
13	Badges: Are the badges properly capped and intact?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
Are dual bed badges separated and individually capped and intact? <input type="checkbox"/> <input type="checkbox"/> <input checked="" type="checkbox"/>				

Lab Sample ID	Container Description	Required pH *	Received pH	Adjusted pH	VOA Headspace (Presence/Absence)	Receipt / Preservation Comments
P1204414-001.01	PUF/XAD-2 (Low Vol)					
P1204414-002.01	Silica Gel DNPH Tube					
P1204414-003.01	PUF/XAD-2 (Low Vol)					
P1204414-004.01	Silica Gel DNPH Tube					
P1204414-005.01	PUF/XAD-2 (Low Vol)					
P1204414-006.01	Silica Gel DNPH Tube					
P1204414-007.01	Silica Gel DNPH Tube					
P1204414-008.01	47 mm Glass Fiber Filter					

Explain any discrepancies: (include lab sample ID numbers): _____

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C1-102412

Client Project ID: Pfizer - Bridgewater NJ

CAS Project ID: P1204414

CAS Sample ID: P1204414-002

Test Code: EPA Method TO-11A
Instrument ID: Agilent Infinity LC 1220/LC3
Analyst: Evelyn Ibarra/Madeleine Dangazyan
Sampling Media: Silica Gel DNPH Tube
Test Notes: BC

Date Collected: 10/24/12
Date Received: 10/26/12
Date Analyzed: 11/1 - 11/5/12
Desorption Volume: 1.0 ml
Volume Sampled: 1723 Liter(s)

CAS #	Compound	Result ng/Sample	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
50-00-0	Formaldehyde	1,900	1.1	0.058	0.89	0.047	M
75-07-0	Acetaldehyde	2,400	1.4	0.058	0.76	0.032	BT
123-38-6	Propionaldehyde	< 100	ND	0.058	ND	0.024	
4170-30-3	Crotonaldehyde, Total	< 100	ND	0.058	ND	0.020	
123-72-8	Butyraldehyde	< 100	ND	0.058	ND	0.020	
100-52-7	Benzaldehyde	130	0.074	0.058	0.017	0.013	
590-86-3	Isovaleraldehyde	< 100	ND	0.058	ND	0.016	
110-62-3	Valeraldehyde	< 100	ND	0.058	ND	0.016	
529-20-4	o-Tolualdehyde	< 100	ND	0.058	ND	0.012	
620-23-5							
104-87-0	m,p-Tolualdehyde	< 200	ND	0.12	ND	0.024	
66-25-1	n-Hexaldehyde	100	0.058	0.058	0.014	0.014	
5779-94-2	2,5-Dimethylbenzaldehyde	100	0.061	0.058	0.011	0.011	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

BC = Results reported are not blank corrected.

BT = Results indicated possible breakthrough; back section > 10% front section.

M = Matrix interference; results may be biased high.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C2-102412

Client Project ID: Pfizer - Bridgewater NJ

CAS Project ID: P1204414

CAS Sample ID: P1204414-004

Test Code: EPA Method TO-11A
Instrument ID: Agilent Infinity LC 1220/LC3
Analyst: Evelyn Ibarra/Madeleine Dangazyan
Sampling Media: Silica Gel DNPH Tube
Test Notes: BC

Date Collected: 10/24/12
Date Received: 10/26/12
Date Analyzed: 11/1 - 11/5/12
Desorption Volume: 1.0 ml
Volume Sampled: 1776 Liter(s)

CAS #	Compound	Result ng/Sample	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
50-00-0	Formaldehyde	680	0.38	0.056	0.31	0.046	
75-07-0	Acetaldehyde	1,800	1.0	0.056	0.57	0.031	BT
123-38-6	Propionaldehyde	< 100		ND	0.056	ND	0.024
4170-30-3	Crotonaldehyde, Total	< 100		ND	0.056	ND	0.020
123-72-8	Butyraldehyde	< 100		ND	0.056	ND	0.019
100-52-7	Benzaldehyde	< 100		ND	0.056	ND	0.013
590-86-3	Isovaleraldehyde	< 100		ND	0.056	ND	0.016
110-62-3	Valeraldehyde	< 100		ND	0.056	ND	0.016
529-20-4	o-Tolualdehyde	< 100		ND	0.056	ND	0.011
620-23-5							
104-87-0	m,p-Tolualdehyde	< 200		ND	0.11	ND	0.023
66-25-1	n-Hexaldehyde	< 100		ND	0.056	ND	0.014
5779-94-2	2,5-Dimethylbenzaldehyde	< 100		ND	0.056	ND	0.010

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

BC = Results reported are not blank corrected.

BT = Results indicated possible breakthrough; back section > 10% front section.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C3-102412

Client Project ID: Pfizer - Bridgewater NJ

CAS Project ID: P1204414

CAS Sample ID: P1204414-006

Test Code: EPA Method TO-11A
 Instrument ID: Agilent Infinity LC 1220/LC3
 Analyst: Evelyn Ibarra/Madeleine Dangazyan
 Sampling Media: Silica Gel DNPH Tube
 Test Notes: BC

Date Collected: 10/24/12
 Date Received: 10/26/12
 Date Analyzed: 11/1 - 11/5/12
 Desorption Volume: 1.0 ml
 Volume Sampled: 1804 Liter(s)

CAS #	Compound	Result ng/Sample	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
50-00-0	Formaldehyde	970	0.54	0.055	0.44	0.045	BT
75-07-0	Acetaldehyde	1,500	0.86	0.055	0.48	0.031	BT
123-38-6	Propionaldehyde	< 100	ND	0.055	ND	0.023	
4170-30-3	Crotonaldehyde, Total	< 100	ND	0.055	ND	0.019	
123-72-8	Butyraldehyde	< 100	ND	0.055	ND	0.019	
100-52-7	Benzaldehyde	< 100	ND	0.055	ND	0.013	
590-86-3	Isovaleraldehyde	< 100	ND	0.055	ND	0.016	
110-62-3	Valeraldehyde	< 100	ND	0.055	ND	0.016	
529-20-4	o-Tolualdehyde	< 100	ND	0.055	ND	0.011	
620-23-5							
104-87-0	m,p-Tolualdehyde	< 200	ND	0.11	ND	0.023	
66-25-1	n-Hexaldehyde	< 100	ND	0.055	ND	0.014	
5779-94-2	2,5-Dimethylbenzaldehyde	< 100	ND	0.055	ND	0.010	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

BC = Results reported are not blank corrected.

BT = Results indicated possible breakthrough; back section > 10% front section.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C3-102412-D

Client Project ID: Pfizer - Bridgewater NJ

CAS Project ID: P1204414

CAS Sample ID: P1204414-007

Test Code: EPA Method TO-11A
Instrument ID: Agilent Infinity LC 1220/LC3
Analyst: Evelyn Ibarra/Madeleine Dangazyan
Sampling Media: Silica Gel DNPH Tube
Test Notes: BC

Date Collected: 10/24/12
Date Received: 10/26/12
Date Analyzed: 11/1 - 11/5/12
Desorption Volume: 1.0 ml
Volume Sampled: 1804 Liter(s)

CAS #	Compound	Result ng/Sample	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
50-00-0	Formaldehyde	< 100	ND	0.055	ND	0.045	
75-07-0	Acetaldehyde	2,500	1.4	0.055	0.77	0.031	BT
123-38-6	Propionaldehyde	< 100	ND	0.055	ND	0.023	
4170-30-3	Crotonaldehyde, Total	< 100	ND	0.055	ND	0.019	
123-72-8	Butyraldehyde	< 100	ND	0.055	ND	0.019	
100-52-7	Benzaldehyde	< 100	ND	0.055	ND	0.013	
590-86-3	Isovaleraldehyde	< 100	ND	0.055	ND	0.016	
110-62-3	Valeraldehyde	< 100	ND	0.055	ND	0.016	
529-20-4	o-Tolualdehyde	< 100	ND	0.055	ND	0.011	
620-23-5							
104-87-0	m,p-Tolualdehyde	< 200	ND	0.11	ND	0.023	
66-25-1	n-Hexaldehyde	< 100	ND	0.055	ND	0.014	
5779-94-2	2,5-Dimethylbenzaldehyde	< 100	ND	0.055	ND	0.010	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

BC = Results reported are not blank corrected.

BT = Results indicated possible breakthrough; back section > 10% front section.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: Method Blank

Client Project ID: Pfizer - Bridgewater NJ

CAS Project ID: P1204414

CAS Sample ID: P121101-MB

Test Code: EPA Method TO-11A
 Instrument ID: Agilent Infinity LC 1220/LC3
 Analyst: Evelyn Ibarra/Madeleine Dangazyan
 Sampling Media: Silica Gel DNPH Tube
 Test Notes: BC

Date Collected: NA
 Date Received: NA
 Date Analyzed: 11/01/12
 Desorption Volume: 1.0 ml
 Volume Sampled: NA Liter(s)

CAS #	Compound	Result ng/Sample	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
50-00-0	Formaldehyde	< 100	NA	NA	NA	NA	
75-07-0	Acetaldehyde	< 100	NA	NA	NA	NA	
123-38-6	Propionaldehyde	< 100	NA	NA	NA	NA	
4170-30-3	Crotonaldehyde, Total	< 100	NA	NA	NA	NA	
123-72-8	Butyraldehyde	< 100	NA	NA	NA	NA	
100-52-7	Benzaldehyde	< 100	NA	NA	NA	NA	
590-86-3	Isovaleraldehyde	< 100	NA	NA	NA	NA	
110-62-3	Valeraldehyde	< 100	NA	NA	NA	NA	
529-20-4	o-Tolualdehyde	< 100	NA	NA	NA	NA	
620-23-5							
104-87-0	m,p-Tolualdehyde	< 200	NA	NA	NA	NA	
66-25-1	n-Hexaldehyde	< 100	NA	NA	NA	NA	
5779-94-2	2,5-Dimethylbenzaldehyde	< 100	NA	NA	NA	NA	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

BC = Results reported are not blank corrected.

NA = Not applicable.

Response Factor Report GCI

Method Path : J:\LC03\METHODS\

Method File : TO11A101512E.M

Title : TO-11A Method for Aldehydes/Ketones by HPLC

Last Update : Fri Oct 19 11:48:51 2012

Response Via : Initial Calibration

Calibration Files

50	=1015120000009.D	100	=1015120000012.D	500	=1015120000015.D
1500	=1015120000018.D	5000	=1015120000021.D	10	=1015120000024.D

	Compound	50	100	500	1500	5000	10	Avg	%RSD
<hr/>									
1)	Formaldehyde	2.155	2.158	2.199	2.218	2.203	2.156	2.182 E4	1.31
2)	Acetaldehyde	1.649	1.625	1.640	1.647	1.635	1.601	1.633 E4	1.09
3)	Acetone	1.183	1.196	1.190	1.197	1.189	1.166	1.187 E4	0.97
4)	Acrolein	1.445	1.447	1.450	1.461	1.453	1.422	1.446 E4	0.90
5)	Propionaldehyde	1.246	1.247	1.252	1.260	1.253	1.227	1.248 E4	0.89
6)	Crotonaldehyde	1.067	1.060	1.057	1.067	1.062	1.040	1.059 E4	0.95
7)	Butyraldehyde	1.030	1.016	1.006	1.021	1.017	0.998	1.015 E4	1.10
8)	Benzaldehyde	6.979	6.993	7.109	7.185	7.159	7.029	7.076 E3	1.24
9)	Isovaleraldehyde	8.878	8.499	8.679	8.720	8.669	8.513	8.660 E3	1.63
10)	Valeraldehyde	8.652	8.474	8.593	8.646	8.612	8.457	8.572 E3	1.00
11)	o-Tolualdehyde	4.322	4.298	4.697	4.918	5.144	5.203	4.764 E3	8.28
12)	m,p-Tolualdehyde	6.216	6.383	6.616	6.681	6.573	6.382	6.475 E3	2.73
13)	Hexaldehyde	7.354	7.269	7.364	7.436	7.429	7.298	7.358 E3	0.92
14)	2,5-Dimethylb...	4.359	4.988	5.204	5.376	5.450	5.371	5.125 E3	8.00

(#= Out of Range

TO11A101512E.M Fri Oct 19 11:48:56 2012

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C1-102412

Client Project ID: Pfizer - Bridgewater NJ

CAS Project ID: P1204414

CAS Sample ID: P1204414-001

Test Code: EPA TO-13A Modified
Instrument ID: HP 5890II+/HP5972A/MS15
Analyst: Madeleine Dangazyan
Sampling Media: PUF/XAD-2 (Low Volume) Cartridge
Test Notes:

Date Collected: 10/24/12
Date Received: 10/26/12
Date Extracted: 10/29/12
Date Analyzed: 11/1/12
Final Volume: 1.0 ml
Volume Sampled: 7425 Liter(s)

CAS #	Compound	Result µg/Cartridge	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
91-20-3	Naphthalene	< 5.0	ND	0.67	ND	0.13	L
208-96-8	Acenaphthylene	< 0.50	ND	0.067	ND	0.011	L
83-32-9	Acenaphthene	< 0.50	ND	0.067	ND	0.011	
86-73-7	Fluorene	< 0.50	ND	0.067	ND	0.0099	
85-01-8	Phenanthrene	< 0.50	ND	0.067	ND	0.0092	
120-12-7	Anthracene	< 0.50	ND	0.067	ND	0.0092	
206-44-0	Fluoranthene	< 0.50	ND	0.067	ND	0.0081	
129-00-0	Pyrene	< 0.50	ND	0.067	ND	0.0081	
56-55-3	Benz(a)anthracene	< 0.50	ND	0.067	ND	0.0072	
218-01-9	Chrysene	< 0.50	ND	0.067	ND	0.0072	
205-99-2	Benzo(b)fluoranthene	< 0.50	ND	0.067	ND	0.0065	
207-08-9	Benzo(k)fluoranthene	< 0.50	ND	0.067	ND	0.0065	
50-32-8	Benzo(a)pyrene	< 0.50	ND	0.067	ND	0.0065	
193-39-5	Indeno(1,2,3-cd)pyrene	< 0.50	ND	0.067	ND	0.0060	
53-70-3	Dibenz(a,h)anthracene	< 0.50	ND	0.067	ND	0.0059	
191-24-2	Benzo(g,h,i)perylene	< 0.50	ND	0.067	ND	0.0060	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

L = Laboratory control sample recovery outside the specified limits, results may be biased low.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C2-102412

Client Project ID: Pfizer - Bridgewater NJ

CAS Project ID: P1204414

CAS Sample ID: P1204414-003

Test Code: EPA TO-13A Modified

Date Collected: 10/24/12

Instrument ID: HP 5890II+/HP5972A/MS15

Date Received: 10/26/12

Analyst: Madeleine Dangazyan

Date Extracted: 10/29/12

Sampling Media: PUF/XAD-2 (Low Volume) Cartridge

Date Analyzed: 11/1/12

Test Notes:
Final Volume: 1.0 ml

Volume Sampled: 7394 Liter(s)

CAS #	Compound	Result µg/Cartridge	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
91-20-3	Naphthalene	< 5.0	ND	0.68	ND	0.13	L
208-96-8	Acenaphthylene	< 0.50	ND	0.068	ND	0.011	L
83-32-9	Acenaphthene	< 0.50	ND	0.068	ND	0.011	
86-73-7	Fluorene	< 0.50	ND	0.068	ND	0.010	
85-01-8	Phenanthrene	< 0.50	ND	0.068	ND	0.0093	
120-12-7	Anthracene	< 0.50	ND	0.068	ND	0.0093	
206-44-0	Fluoranthene	< 0.50	ND	0.068	ND	0.0082	
129-00-0	Pyrene	< 0.50	ND	0.068	ND	0.0082	
56-55-3	Benz(a)anthracene	< 0.50	ND	0.068	ND	0.0072	
218-01-9	Chrysene	< 0.50	ND	0.068	ND	0.0072	
205-99-2	Benzo(b)fluoranthene	< 0.50	ND	0.068	ND	0.0066	
207-08-9	Benzo(k)fluoranthene	< 0.50	ND	0.068	ND	0.0066	
50-32-8	Benzo(a)pyrene	< 0.50	ND	0.068	ND	0.0066	
193-39-5	Indeno(1,2,3-cd)pyrene	< 0.50	ND	0.068	ND	0.0060	
53-70-3	Dibenz(a,h)anthracene	< 0.50	ND	0.068	ND	0.0059	
191-24-2	Benzo(g,h,i)perylene	< 0.50	ND	0.068	ND	0.0060	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

L = Laboratory control sample recovery outside the specified limits, results may be biased low.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C3-102412

Client Project ID: Pfizer - Bridgewater NJ

CAS Project ID: P1204414

CAS Sample ID: P1204414-005

Test Code: EPA TO-13A Modified

Date Collected: 10/24/12

Instrument ID: HP 5890II+/HP5972A/MS15

Date Received: 10/26/12

Analyst: Madeleine Dangazyan

Date Extracted: 10/29/12

Sampling Media: PUF/XAD-2 (Low Volume) Cartridge

Date Analyzed: 11/1/12

Test Notes:
Final Volume: 1.0 ml

Volume Sampled: 7455 Liter(s)

CAS #	Compound	Result µg/Cartridge	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
91-20-3	Naphthalene	< 5.0	ND	0.67	ND	0.13	L
208-96-8	Acenaphthylene	< 0.50	ND	0.067	ND	0.011	L
83-32-9	Acenaphthene	< 0.50	ND	0.067	ND	0.011	
86-73-7	Fluorene	< 0.50	ND	0.067	ND	0.0099	
85-01-8	Phenanthrene	< 0.50	ND	0.067	ND	0.0092	
120-12-7	Anthracene	< 0.50	ND	0.067	ND	0.0092	
206-44-0	Fluoranthene	< 0.50	ND	0.067	ND	0.0081	
129-00-0	Pyrene	< 0.50	ND	0.067	ND	0.0081	
56-55-3	Benz(a)anthracene	< 0.50	ND	0.067	ND	0.0072	
218-01-9	Chrysene	< 0.50	ND	0.067	ND	0.0072	
205-99-2	Benzo(b)fluoranthene	< 0.50	ND	0.067	ND	0.0065	
207-08-9	Benzo(k)fluoranthene	< 0.50	ND	0.067	ND	0.0065	
50-32-8	Benzo(a)pyrene	< 0.50	ND	0.067	ND	0.0065	
193-39-5	Indeno(1,2,3-cd)pyrene	< 0.50	ND	0.067	ND	0.0059	
53-70-3	Dibenz(a,h)anthracene	< 0.50	ND	0.067	ND	0.0059	
191-24-2	Benzo(g,h,i)perylene	< 0.50	ND	0.067	ND	0.0059	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

L = Laboratory control sample recovery outside the specified limits, results may be biased low.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: Method Blank

Client Project ID: Pfizer - Bridgewater NJ

CAS Project ID: P1204414

CAS Sample ID: P121029-MB

Test Code: EPA TO-13A Modified
 Instrument ID: HP 5890II+/HP5972A/MS15
 Analyst: Madeleine Dangazyan
 Sampling Media: PUF/XAD-2 (Low Volume) Cartridge
 Test Notes:

Date Collected: NA
 Date Received: NA
 Date Extracted: 10/29/12
 Date Analyzed: 11/01/12
 Final Volume: 1.0 ml
 Volume Sampled: NA Liter(s)

CAS #	Compound	Result µg/Cartridge	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
91-20-3	Naphthalene	< 5.0	NA	NA	NA	NA	L
208-96-8	Acenaphthylene	< 0.50	NA	NA	NA	NA	L
83-32-9	Acenaphthene	< 0.50	NA	NA	NA	NA	
86-73-7	Fluorene	< 0.50	NA	NA	NA	NA	
85-01-8	Phenanthrene	< 0.50	NA	NA	NA	NA	
120-12-7	Anthracene	< 0.50	NA	NA	NA	NA	
206-44-0	Fluoranthene	< 0.50	NA	NA	NA	NA	
129-00-0	Pyrene	< 0.50	NA	NA	NA	NA	
56-55-3	Benz(a)anthracene	< 0.50	NA	NA	NA	NA	
218-01-9	Chrysene	< 0.50	NA	NA	NA	NA	
205-99-2	Benzo(b)fluoranthene	< 0.50	NA	NA	NA	NA	
207-08-9	Benzo(k)fluoranthene	< 0.50	NA	NA	NA	NA	
50-32-8	Benzo(a)pyrene	< 0.50	NA	NA	NA	NA	
193-39-5	Indeno(1,2,3-cd)pyrene	< 0.50	NA	NA	NA	NA	
53-70-3	Dibenz(a,h)anthracene	< 0.50	NA	NA	NA	NA	
191-24-2	Benzo(g,h,i)perylene	< 0.50	NA	NA	NA	NA	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

L = Laboratory control sample recovery outside the specified limits, results may be biased low.

NA = Not applicable.

SURROGATE SPIKE RECOVERY RESULTS

Page 1 of 1

Client: CH2M Hill
Client Project ID: Pfizer - Bridgewater NJ

CAS Project ID: P1204414

Test Code: EPA TO-13A Modified
Instrument ID: HP 5890II+/HP5972A/MS15
Analyst: Madeleine Dangazyan
Sampling Media: PUF/XAD-2 (Low Volume) Cartridge(s)
Test Notes:

Date(s) Collected: 10/24/12
Date(s) Received: 10/26/12
Date(s) Extracted: 10/29/12
Date(s) Analyzed: 11/1/12

Client Sample ID	CAS Sample ID	Fluorene-d10		Pyrene-d10		Data Qualifier
		% Recovered	Acceptance Limits	% Recovered	Acceptance Limits	
Method Blank	P121029-MB	73	60-120	83	60-120	
Lab Control Sample	P121029-LCS	84	60-120	86	60-120	
Duplicate Lab Control Sample	P121029-DLCS	64	60-120	84	60-120	
PZAA-C1-102412	P1204414-001	73	60-120	84	60-120	
PZAA-C2-102412	P1204414-003	49	60-120	81	60-120	
PZAA-C3-102412	P1204414-005	76	60-120	88	60-120	S

S = Surrogate recovery not within specified limits.

LABORATORY CONTROL SAMPLE / DUPLICATE LABORATORY CONTROL SAMPLE SUMMARY

Page 1 of 1

Client: CH2M Hill

Client Sample ID: Duplicate Lab Control Sample

Client Project ID: Pfizer - Bridgewater NJ

CAS Project ID: P1204414

CAS Sample ID: P121029-DLCS

Test Code: EPA TO-13A Modified

Date Collected: NA

Instrument ID: HP 5890II+/HP5972A/MS15

Date Received: NA

Analyst: Madeleine Dangazyan

Date Extracted: 10/29/12

Sampling Media: PUF/XAD-2 (Low Volume) Cartridge

Date Analyzed: 11/01/12

Test Notes:

Volume(s) Analyzed: NA Liter(s)

CAS #	Compound	Spike Amount		Result		CAS		RPD	RPD	Data Limit	Data Qualifier
		LCS / DLCS µg/ml	% Recovery µg/ml	LCS µg/ml	DLCS µg/ml	LCS	DLCS				
91-20-3	Naphthalene	5.00	3.45	2.54	69	51	60-120	30	18	L, R	
208-96-8	Acenaphthylene	5.00	3.04	2.52	61	50	60-120	20	18	L, R	
83-32-9	Acenaphthene	5.00	3.68	3.09	74	62	60-120	18	19		
86-73-7	Fluorene	5.00	4.38	3.03	88	61	60-120	36	20	R	
85-01-8	Phenanthrene	5.00	4.24	3.71	85	74	60-120	14	20		
120-12-7	Anthracene	5.00	3.80	3.47	76	69	60-120	10	19		
206-44-0	Fluoranthene	5.00	4.29	4.03	86	81	60-120	6	21		
129-00-0	Pyrene	5.00	4.37	4.15	87	83	60-120	5	21		
56-55-3	Benz(a)anthracene	5.00	4.78	4.36	96	87	60-120	10	17		
218-01-9	Chrysene	5.00	4.61	4.45	92	89	60-120	3	17		
205-99-2	Benzo(b)fluoranthene	5.00	5.22	4.90	104	98	60-120	6	18		
207-08-9	Benzo(k)fluoranthene	5.00	5.15	4.82	103	96	60-120	7	19		
50-32-8	Benzo(a)pyrene	5.00	4.60	4.64	92	93	60-120	1	19		
193-39-5	Indeno(1,2,3-cd)pyrene	5.00	4.93	4.44	99	89	60-120	11	19		
53-70-3	Dibenz(a,h)anthracene	5.00	4.81	4.72	96	94	60-120	2	20		
191-24-2	Benzo(g,h,i)perylene	5.00	4.84	4.61	97	92	60-120	5	22		

L = Laboratory control sample recovery outside the specified limits, results may be biased low.

R = Duplicate precision not met.

COMPOUND	50	100	500	1500	5000	10000	AVERAGE	SD	%RSD
Formaldehyde	21551.58667	21578.11333	21994.02667	22183.97644	22027.73027	21555.66553	218E+04	2.85E+02	1.31%
Acetaldehyde	16494.83333	16248.32	16397.726	16470.09311	16346.022	16013.62407	1.63E+04	1.78E+02	1.09%
Acetone	11825.64667	11959.76	11901.04733	11965.75533	11886.62027	11655.60893	1.19E+04	1.15E+02	0.97%
Acrolein	14451.66667	14470.94667	14498.18333	14612.84289	14525.07733	14223.9314	1.45E+04	1.30E+02	0.90%
Propionaldehyde	12462	12466.51333	12520.376	12603.92156	12530.74373	12274.80453	1.25E+04	1.11E+02	0.89%
Crotonaldehyde	10668.6	10599.19333	10568.68867	10666.33933	10616.61333	10397.92593	1.06E+04	1.00E+02	0.95%
Butyraldehyde	10297.20667	10161.92333	10062.19333	10213.51	10174.49173	9980.627967	1.01E+04	1.12E+02	1.10%
Benzaldehyde	6978.86	6992.64667	7109.495333	7185.295111	7159.001333	7028.6106	7.08E+03	8.78E+01	1.24%
Isovaleraldehyde	8878.426667	8499.36	8678.983333	8719.648	8668.6952	8513.230967	8.66E+03	1.41E+02	1.63%
Valeraldehyde	8652.386667	8473.953333	8592.646	8646.319111	8611.965133	8457.469933	8.57E+03	8.57E+01	1.00%
o-Tolualdehyde	4321.87333	4298.17333	4696.914	4918.300667	5143.593667	5202.781367	4.76E+03	3.94E+02	8.28%
m,p-Tolualdehyde	6216.013333	6382.516667	6616.206667	6681.352111	6572.818067	6382.0148	6.48E+03	1.77E+02	2.73%
Hexaldehyde	7353.966667	7268.806667	7363.899333	7436.382889	7429.0074	7298.153967	7.36E+03	6.75E+01	0.92%
2,5-Dimethylbenzaldehyde	4359.2	4988.423333	5204.160667	5375.690889	5449.895333	5370.6828	5.12E+03	4.10E+02	8.00%

ALS Environmental

TO11A Aldehyde & Ketone DNPNA Analysis by HPLC

Instrument : LC 03 Printed : 11/17/2012
 Detector : UV-VIS 360 Date Acquired : 11/1/2012
 Analyst : MD/EI Sample Amount : 2.5uL
 Client & Job# : CH2M Hill P1204414

QC

QC									
Sample Information	MRL	TC-11A 1500ng/ml S26-10041208 % Diff	ACN Blank lot DE483	MB Back lot 10770447641 1.0ml	MB Front lot 10770447641 1.0ml	0	0	TO-11A 1500ng/ml S26-10041208 % Diff	TO-11A 1500ng/ml S26-10041208 % Diff
Dilution	1.0	NA	1.0	1.0	1.0	1.0	1.0	1500ng/ml S26-10041208 % Diff	1500ng/ml S26-10041208 % Diff
Sample Volume (L)	NA	NA	NA	NA	NA	NA	NA		
Final Vol.(mL)	1.0	1.0	1.0	1.0	1.0	1.0	1.0		
Data File	11011200000 002.D	11011200000 110112000000 110112000000 3.D	11011200000 4.D	11011200000 5.D	0.0	0.0	0.0	1101120000 014.D	1101120000 027.D
	ng/sample	ng/sample	ng/sample	ng/sample	ng/sample	ng/sample	ng/sample	ng/sample	ng/sample
Formaldehyde	100.00	1513.4	0.9%	ND	ND	ND	ND	1514.8	1.0%
Acetaldehyde	100.00	1495.8	0.3%	ND	ND	ND	ND	1504.5	0.3%
Propionaldehyde	100.00	1496.4	0.2%	ND	ND	ND	ND	1497.9	0.1%
Crotonaldehyde	100.00	1476.6	1.6%	ND	ND	ND	ND	1489.2	0.7%
Butyraldehyde	100.00	1481.9	1.2%	ND	ND	ND	ND	1485.7	1.0%
Benzaldehyde	100.00	1482.4	1.2%	ND	ND	ND	ND	1519.5	1.3%
Isovaleraldehyde	100.00	1491.0	0.6%	ND	ND	ND	ND	1584.5	5.6%
Valeraldehyde	100.00	1492.4	0.5%	ND	ND	ND	ND	1619.2	7.9%
o-Toluualdehyde	100.00	1404.9	6.3%	ND	ND	ND	ND	1550.8	3.4%
m,p-Toluualdehyde	200.00	3092.9	3.1%	ND	ND	ND	ND	3076.1	2.5%
Hexaldehyde	100.00	1505.5	0.4%	ND	ND	ND	ND	1511.7	0.8%
2,5-Dimethylbenzaldehyde	100.00	1514.8	1.0%	ND	ND	ND	ND	1580.9	5.4%

ALS Environmental

TO11A Aldehyde & Ketone DNPH Analysis by HPLC

Instrument : LC 03
 Detector : UV-VIS 360
 Analyst : MD/EI
 Client & Job# : CH2M Hill P1204414

Printed : 11/17/2012
 Date Acquired : 11/15/2012
 Sample Amount : 2.5uL

QC

Sample Information		ACN Blank lot DE483		MB Back 10770477641 1.0ml		MB Front 10770477641 1.0ml		TO-11A 1500ng/ml S26-10041208		TO-11A 1500ng/ml S26-10041208		% Diff		
Dilution	1.0	NA		1.0		1.0		1.0		1.0				
Sample Volume (L)	Final Vol.(mL)		NA		NA		NA		NA					
Data File	11011200000 002.D		110512000000 3.D		110112000000 4.D		110112000000 5.D		0.0		0.0			
ng/sample														
Formaldehyde	100.00	1513.4	0.9%	ND	ND	ND	ND	ND	1539.1	2.6%	1548.6	3.2%	1530.7	2.0%
Acetaldehyde	100.00	1495.8	0.3%	ND	ND	ND	ND	ND	1517.3	1.2%	1531.0	2.1%	1516.5	1.1%
Propionaldehyde	100.00	1496.4	0.2%	ND	ND	ND	ND	ND	1520.7	1.4%	1527.6	1.8%	1510.8	0.7%
Crotonaldehyde	100.00	1476.6	1.6%	ND	ND	ND	ND	ND	1504.5	0.3%	1518.7	1.2%	1502.8	0.2%
Butyraldehyde	100.00	1481.9	1.2%	ND	ND	ND	ND	ND	1513.8	0.9%	1518.8	1.3%	1501.2	0.1%
Benzaldehyde	100.00	1482.4	1.2%	ND	ND	ND	ND	ND	1524.0	1.6%	1532.1	2.1%	1528.5	1.9%
Isovaleraldehyde	100.00	1491.0	0.6%	ND	ND	ND	ND	ND	1527.1	1.8%	1531.3	2.1%	1518.6	1.2%
Valeraldehyde	100.00	1492.4	0.5%	ND	ND	ND	ND	ND	1527.3	1.8%	1531.3	2.1%	1522.9	1.5%
o-Tolualdehyde	100.00	1404.9	6.3%	ND	ND	ND	ND	ND	1467.5	2.2%	1505.8	0.4%	1573.4	4.9%
m,p-Tolualdehyde	200.00	3092.9	3.1%	ND	ND	ND	ND	ND	3146.2	4.9%	3143.9	9.6%	3104.6	3.5%
Hexaldehyde	100.00	1505.5	0.4%	ND	ND	ND	ND	ND	1522.8	1.5%	1537.5	2.5%	1542.4	2.8%
2,5-Dimethylbenzaldehyde	100.00	1514.8	1.0%	ND	ND	ND	ND	ND	1555.3	3.7%	1551.9	3.5%	1585.8	5.7%

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C1-102412

Client Project ID: Pfizer - Bridgewater NJ

CAS Project ID: P1204414

CAS Sample ID: P1204414-001

Test Code: EPA TO-13A Modified

Date Collected: 10/24/12

Instrument ID: HP 5890II+/HP5972A/MS15

Date Received: 10/26/12

Analyst: Madeleine Dangazyan

Date Extracted: 10/29/12

Sampling Media: PUF/XAD-2 (Low Volume) Cartridge

Date Analyzed: 11/1/12

Test Notes:
Final Volume: 1.0 ml

Volume Sampled: 7425 Liter(s)

CAS #	Compound	Result µg/Cartridge	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
91-20-3	Naphthalene	< 5.0	ND	0.67	ND	0.13	L
208-96-8	Acenaphthylene	< 0.50	ND	0.067	ND	0.011	L
83-32-9	Acenaphthene	< 0.50	ND	0.067	ND	0.011	
86-73-7	Fluorene	< 0.50	ND	0.067	ND	0.0099	
85-01-8	Phenanthrene	< 0.50	ND	0.067	ND	0.0092	
120-12-7	Anthracene	< 0.50	ND	0.067	ND	0.0092	
206-44-0	Fluoranthene	< 0.50	ND	0.067	ND	0.0081	
129-00-0	Pyrene	< 0.50	ND	0.067	ND	0.0081	
56-55-3	Benz(a)anthracene	< 0.50	ND	0.067	ND	0.0072	
218-01-9	Chrysene	< 0.50	ND	0.067	ND	0.0072	
205-99-2	Benzo(b)fluoranthene	< 0.50	ND	0.067	ND	0.0065	
207-08-9	Benzo(k)fluoranthene	< 0.50	ND	0.067	ND	0.0065	
50-32-8	Benzo(a)pyrene	< 0.50	ND	0.067	ND	0.0065	
193-39-5	Indeno(1,2,3-cd)pyrene	< 0.50	ND	0.067	ND	0.0060	
53-70-3	Dibenz(a,h)anthracene	< 0.50	ND	0.067	ND	0.0059	
191-24-2	Benzo(g,h,i)perylene	< 0.50	ND	0.067	ND	0.0060	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

L = Laboratory control sample recovery outside the specified limits, results may be biased low.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C2-102412

Client Project ID: Pfizer - Bridgewater NJ

CAS Project ID: P1204414

CAS Sample ID: P1204414-003

Test Code: EPA TO-13A Modified

Date Collected: 10/24/12

Instrument ID: HP 5890II+/HP5972A/MS15

Date Received: 10/26/12

Analyst: Madeleine Dangazyan

Date Extracted: 10/29/12

Sampling Media: PUF/XAD-2 (Low Volume) Cartridge

Date Analyzed: 11/1/12

Test Notes:
Final Volume: 1.0 ml

Volume Sampled: 7394 Liter(s)

CAS #	Compound	Result µg/Cartridge	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
91-20-3	Naphthalene	< 5.0	ND	0.68	ND	0.13	L
208-96-8	Acenaphthylene	< 0.50	ND	0.068	ND	0.011	L
83-32-9	Acenaphthene	< 0.50	ND	0.068	ND	0.011	
86-73-7	Fluorene	< 0.50	ND	0.068	ND	0.010	
85-01-8	Phenanthrene	< 0.50	ND	0.068	ND	0.0093	
120-12-7	Anthracene	< 0.50	ND	0.068	ND	0.0093	
206-44-0	Fluoranthene	< 0.50	ND	0.068	ND	0.0082	
129-00-0	Pyrene	< 0.50	ND	0.068	ND	0.0082	
56-55-3	Benz(a)anthracene	< 0.50	ND	0.068	ND	0.0072	
218-01-9	Chrysene	< 0.50	ND	0.068	ND	0.0072	
205-99-2	Benzo(b)fluoranthene	< 0.50	ND	0.068	ND	0.0066	
207-08-9	Benzo(k)fluoranthene	< 0.50	ND	0.068	ND	0.0066	
50-32-8	Benzo(a)pyrene	< 0.50	ND	0.068	ND	0.0066	
193-39-5	Indeno(1,2,3-cd)pyrene	< 0.50	ND	0.068	ND	0.0060	
53-70-3	Dibenz(a,h)anthracene	< 0.50	ND	0.068	ND	0.0059	
191-24-2	Benzo(g,h,i)perylene	< 0.50	ND	0.068	ND	0.0060	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

L = Laboratory control sample recovery outside the specified limits, results may be biased low.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C3-102412

Client Project ID: Pfizer - Bridgewater NJ

CAS Project ID: P1204414

CAS Sample ID: P1204414-005

Test Code: EPA TO-13A Modified

Date Collected: 10/24/12

Instrument ID: HP 5890II+/HP5972A/MS15

Date Received: 10/26/12

Analyst: Madeleine Dangazyan

Date Extracted: 10/29/12

Sampling Media: PUF/XAD-2 (Low Volume) Cartridge

Date Analyzed: 11/1/12

Test Notes:

Final Volume: 1.0 ml

Volume Sampled: 7455 Liter(s)

CAS #	Compound	Result µg/Cartridge	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
91-20-3	Naphthalene	< 5.0	ND	0.67	ND	0.13	L
208-96-8	Acenaphthylene	< 0.50	ND	0.067	ND	0.011	L
83-32-9	Acenaphthene	< 0.50	ND	0.067	ND	0.011	
86-73-7	Fluorene	< 0.50	ND	0.067	ND	0.0099	
85-01-8	Phenanthrene	< 0.50	ND	0.067	ND	0.0092	
120-12-7	Anthracene	< 0.50	ND	0.067	ND	0.0092	
206-44-0	Fluoranthene	< 0.50	ND	0.067	ND	0.0081	
129-00-0	Pyrene	< 0.50	ND	0.067	ND	0.0081	
56-55-3	Benz(a)anthracene	< 0.50	ND	0.067	ND	0.0072	
218-01-9	Chrysene	< 0.50	ND	0.067	ND	0.0072	
205-99-2	Benzo(b)fluoranthene	< 0.50	ND	0.067	ND	0.0065	
207-08-9	Benzo(k)fluoranthene	< 0.50	ND	0.067	ND	0.0065	
50-32-8	Benzo(a)pyrene	< 0.50	ND	0.067	ND	0.0065	
193-39-5	Indeno(1,2,3-cd)pyrene	< 0.50	ND	0.067	ND	0.0059	
53-70-3	Dibenz(a,h)anthracene	< 0.50	ND	0.067	ND	0.0059	
191-24-2	Benzo(g,h,i)perylene	< 0.50	ND	0.067	ND	0.0059	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

L = Laboratory control sample recovery outside the specified limits, results may be biased low.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: Method Blank

Client Project ID: Pfizer - Bridgewater NJ

CAS Project ID: P1204414

CAS Sample ID: P121029-MB

Test Code: EPA TO-13A Modified
Instrument ID: HP 5890II+/HP5972A/MS15
Analyst: Madeleine Dangazyan
Sampling Media: PUF/XAD-2 (Low Volume) Cartridge
Test Notes:

Date Collected: NA
Date Received: NA
Date Extracted: 10/29/12
Date Analyzed: 11/01/12
Final Volume: 1.0 ml
Volume Sampled: NA Liter(s)

CAS #	Compound	Result µg/Cartridge	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
91-20-3	Naphthalene	< 5.0	NA	NA	NA	NA	L
208-96-8	Acenaphthylene	< 0.50	NA	NA	NA	NA	L
83-32-9	Acenaphthene	< 0.50	NA	NA	NA	NA	
86-73-7	Fluorene	< 0.50	NA	NA	NA	NA	
85-01-8	Phenanthrene	< 0.50	NA	NA	NA	NA	
120-12-7	Anthracene	< 0.50	NA	NA	NA	NA	
206-44-0	Fluoranthene	< 0.50	NA	NA	NA	NA	
129-00-0	Pyrene	< 0.50	NA	NA	NA	NA	
56-55-3	Benz(a)anthracene	< 0.50	NA	NA	NA	NA	
218-01-9	Chrysene	< 0.50	NA	NA	NA	NA	
205-99-2	Benzo(b)fluoranthene	< 0.50	NA	NA	NA	NA	
207-08-9	Benzo(k)fluoranthene	< 0.50	NA	NA	NA	NA	
50-32-8	Benzo(a)pyrene	< 0.50	NA	NA	NA	NA	
193-39-5	Indeno(1,2,3-cd)pyrene	< 0.50	NA	NA	NA	NA	
53-70-3	Dibenz(a,h)anthracene	< 0.50	NA	NA	NA	NA	
191-24-2	Benzo(g,h,i)perylene	< 0.50	NA	NA	NA	NA	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

L = Laboratory control sample recovery outside the specified limits, results may be biased low.

NA = Not applicable.

SURROGATE SPIKE RECOVERY RESULTS

Page 1 of 1

Client: CH2M Hill
Client Project ID: Pfizer - Bridgewater NJ

CAS Project ID: P1204414

Test Code: EPA TO-13A Modified
Instrument ID: HP 5890II+/HP5972A/MS15
Analyst: Madeleine Dangazyan
Sampling Media: PUF/XAD-2 (Low Volume) Cartridge(s)
Test Notes:

Date(s) Collected: 10/24/12
Date(s) Received: 10/26/12
Date(s) Extracted: 10/29/12
Date(s) Analyzed: 11/1/12

Client Sample ID	CAS Sample ID	Fluorene-d10		Pyrene-d10		Data Qualifier
		% Recovered	Acceptance Limits	% Recovered	Acceptance Limits	
Method Blank	P121029-MB	73	60-120	83	60-120	
Lab Control Sample	P121029-LCS	84	60-120	86	60-120	
Duplicate Lab Control Sample	P121029-DLCS	64	60-120	84	60-120	
PZAA-C1-102412	P1204414-001	73	60-120	84	60-120	
PZAA-C2-102412	P1204414-003	49	60-120	81	60-120	
PZAA-C3-102412	P1204414-005	76	60-120	88	60-120	S

S = Surrogate recovery not within specified limits.

LABORATORY CONTROL SAMPLE / DUPLICATE LABORATORY CONTROL SAMPLE SUMMARY

Page 1 of 1

Client: CH2M Hill

Client Sample ID: Duplicate Lab Control Sample

Client Project ID: Pfizer - Bridgewater NJ

CAS Project ID: P1204414

CAS Sample ID: P121029-DLCS

Test Code: EPA TO-13A Modified

Date Collected: NA

Instrument ID: HP 5890II+/HP5972A/MS15

Date Received: NA

Analyst: Madeleine Dangazyan

Date Extracted: 10/29/12

Sampling Media: PUF/XAD-2 (Low Volume) Cartridge

Date Analyzed: 11/01/12

Test Notes:

Volume(s) Analyzed: NA Liter(s)

CAS #	Compound	Spike Amount		Result		CAS		RPD	RPD	Data Limit	Data Qualifier
		LCS / DLCS µg/ml	% Recovery µg/ml	LCS µg/ml	DLCS µg/ml	LCS	DLCS				
91-20-3	Naphthalene	5.00	3.45	2.54	69	51	60-120	30	18	L, R	
208-96-8	Acenaphthylene	5.00	3.04	2.52	61	50	60-120	20	18	L, R	
83-32-9	Acenaphthene	5.00	3.68	3.09	74	62	60-120	18	19		
86-73-7	Fluorene	5.00	4.38	3.03	88	61	60-120	36	20	R	
85-01-8	Phenanthrene	5.00	4.24	3.71	85	74	60-120	14	20		
120-12-7	Anthracene	5.00	3.80	3.47	76	69	60-120	10	19		
206-44-0	Fluoranthene	5.00	4.29	4.03	86	81	60-120	6	21		
129-00-0	Pyrene	5.00	4.37	4.15	87	83	60-120	5	21		
56-55-3	Benz(a)anthracene	5.00	4.78	4.36	96	87	60-120	10	17		
218-01-9	Chrysene	5.00	4.61	4.45	92	89	60-120	3	17		
205-99-2	Benzo(b)fluoranthene	5.00	5.22	4.90	104	98	60-120	6	18		
207-08-9	Benzo(k)fluoranthene	5.00	5.15	4.82	103	96	60-120	7	19		
50-32-8	Benzo(a)pyrene	5.00	4.60	4.64	92	93	60-120	1	19		
193-39-5	Indeno(1,2,3-cd)pyrene	5.00	4.93	4.44	99	89	60-120	11	19		
53-70-3	Dibenz(a,h)anthracene	5.00	4.81	4.72	96	94	60-120	2	20		
191-24-2	Benzo(g,h,i)perylene	5.00	4.84	4.61	97	92	60-120	5	22		

L = Laboratory control sample recovery outside the specified limits, results may be biased low.

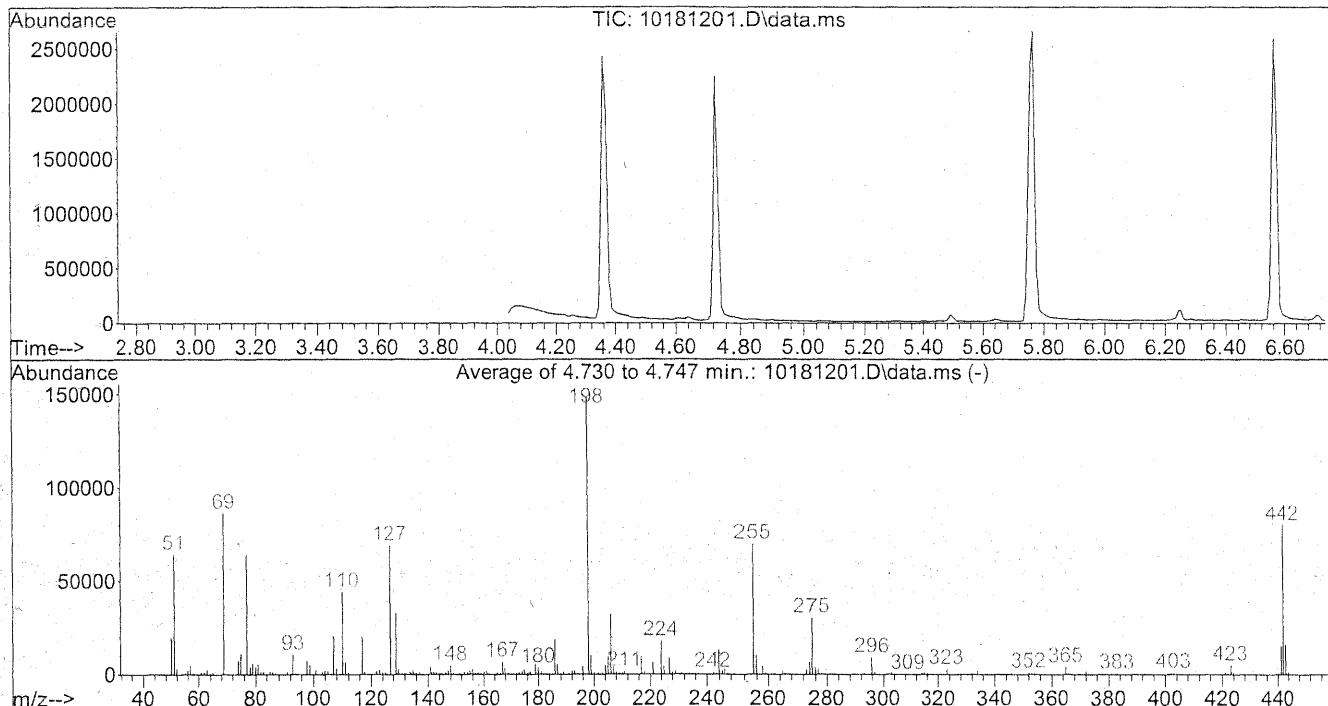
R = Duplicate precision not met.

Data Path : J:\MS15\DATA\TO13\2012_10\18\
 Data File : 10181201.D
 Acq On : 18 Oct 2012 2:27 pm
 Operator : MD
 Sample : 50ug/ml DFTPP tune check S26-07181214
 Misc : db-5ms 30x.25x.25
 ALS Vial : 1 Sample Multiplier: 1

Integration File: events.e

Method : J:\MS15\METHODS\PS101812E.M
 Title : TO-13A Modified For PAHs in SIM
 Last Update : Thu Oct 18 18:10:27 2012

(R) plateau



AutoFind: Scans 78, 79, 80; Background Corrected with Scan 72

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
51	198	30	60	43.4	64224	PASS
68	69	0.00	2	0.1	126	PASS
69	198	0.00	100	58.3	86237	PASS
70	69	0.00	2	0.3	254	PASS
127	198	40	60	46.7	68969	PASS
197	198	0.00	1	0.0	0	PASS
198	198	100	100	100.0	147828	PASS
199	198	5	9	6.8	10049	PASS
275	198	10	30	20.3	30036	PASS
365	198	1	100	2.6	3867	PASS
441	443	0.01	100	94.7	14863	PASS
442	198	40	100	54.1	79957	PASS
443	442	17	23	19.6	15693	PASS

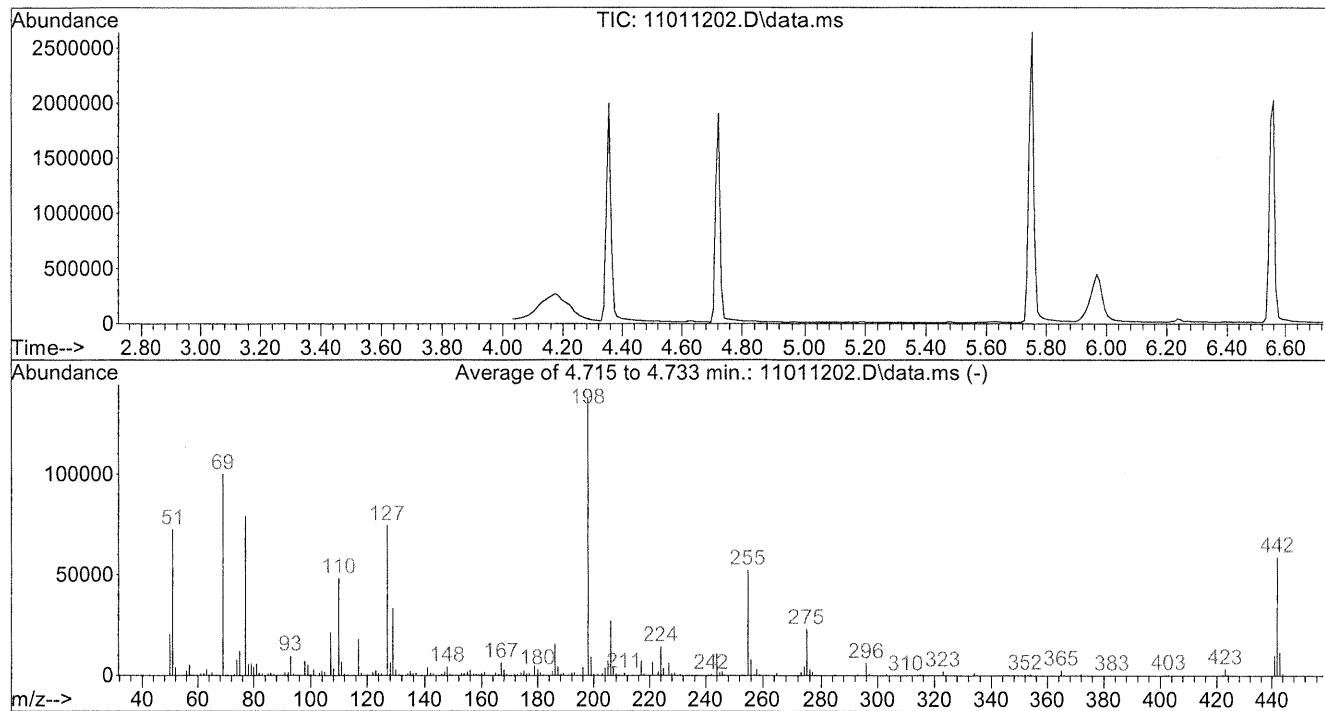
DFTPP

Data Path : J:\MS15\DATA\TO13\2012_11\01\
 Data File : 11011202.D
 Acq On : 1 Nov 2012 10:43 am
 Operator : MD
 Sample : 50ug/ml DFTPP tune check S26-07181214
 Misc :
 ALS Vial : 1 Sample Multiplier: 1

Integration File: events.e

Method : J:\MS15\METHODS\PS101812E.M
 Title : TO-13A Modified For PAHs in SIM
 Last Update : Thu Oct 18 18:10:27 2012

M. J. 11/12



AutoFind: Scans 77, 78, 79; Background Corrected with Scan 72

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
51	198	30	60	52.7	72461	PASS
68	69	0.00	2	0.0	0	PASS
69	198	0.00	100	72.6	99858	PASS
70	69	0.00	2	0.2	238	PASS
127	198	40	60	54.1	74344	PASS
197	198	0.00	1	0.0	0	PASS
198	198	100	100	100.0	137461	PASS
199	198	5	9	6.7	9278	PASS
275	198	10	30	16.7	22966	PASS
365	198	1	100	1.9	2565	PASS
441	443	0.01	100	88.0	10059	PASS
442	198	40	100	42.7	58701	PASS
443	442	17	23	19.5	11426	PASS

Method Path : J:\MS15\METHODS\

Method File : PS101812E.M

Title : TO-13A Modified For PAHs in SIM

Last Update : Thu Oct 18 18:10:27 2012

Response Via : Initial Calibration

Calibration Files

0.5	=10181203.D	1	=10181204.D	5	=10181205.D	10	=10181206.D
20	=10181207.D	40	=10181208.D				

	Compound	0.5	1	5	10	20	40	Avg	%RSD
<hr/>									
1)	I Naphthalene-d8	-----ISTD-----							
2)	Naphthalene	1.250	1.186	1.152	1.056	1.007	1.053	1.117	8.35
3)	I Acenaphthene-d10	-----ISTD-----							
4)	Acenaphthylene	2.252	2.290	2.184	1.971	1.768	1.746	2.035	11.90
5)	Acenaphthene	1.497	1.381	1.281	1.125	0.980	0.947	1.202	18.43
6)	S Fluorene-d10	1.409	1.261	1.112	0.965	0.874	1.000	1.104	18.19
7)	Fluorene	1.456	1.400	1.297	1.220	1.171	1.112	1.276	10.48
8)	I Phenanthrene-d10	-----ISTD-----							
9)	Phenanthrene	1.378	1.289	1.190	1.041	0.995	1.039	1.155	13.49
10)	Anthracene	1.403	1.419	1.293	1.215	1.133	1.230	1.282	8.74
11)	S Fluoranthene-d10	1.246	1.152	1.113	0.969	0.963	1.000	1.074	10.71
12)	Fluoranthene	1.378	1.349	1.267	1.111	1.080	1.133	1.219	10.56
13)	S Pyrene-d10	1.025	0.977	0.960	0.870	0.826	0.873	0.922	8.32
14)	Pyrene	1.407	1.363	1.314	1.177	1.117	1.153	1.255	9.69
15)	I Chrysene-d12	-----ISTD-----							
16)	Benzo[a]anthra...	1.507	1.416	1.342	1.262	1.202	1.356	1.348	8.04
17)	Chrysene	1.503	1.478	1.356	1.317	1.186	1.343	1.364	8.47
18)	I Perylene-d12	-----ISTD-----							
19)	Benzo[b]fluora...	1.338	1.263	1.246	1.126	1.043	1.046	1.177	10.46
20)	Benzo[k]fluora...	1.517	1.452	1.364	1.121	1.106	1.071	1.272	15.40
21)	S Benzo[a]pyrene...	0.895	0.892	0.841	0.786	0.741	0.773	0.821	7.87
22)	Benzo[a]pyrene	1.157	1.174	1.154	1.077	0.991	1.017	1.095	7.16
23)	Indeno[1,2,3-c...	1.098	1.257	1.210	1.096	0.982	1.027	1.112	9.45
24)	Dibenz[a,h]ant...	1.235	1.237	1.145	1.073	0.969	0.975	1.105	10.90
25)	Benzo[g,h,i]pe...	1.291	1.198	1.144	1.106	1.013	1.034	1.131	9.19

(#= Out of Range)

Columbia Analytical Services**TO13A Daily CCV QC Check**

Date Acquired : 11/1/2012
 Instrument : MS15

Analyst : MD
 Printed : 11/5/2012

CCV Level : 5 ug/ml

CCV RRF QC Check

(Less than 30% Difference from ICAL and Greater Than Minimum RRF)

CCV RRF QC	ICAL Mean RRF	5ug/ml PAHs CCV S26-07181209	% RRF Difference	Minimum RRF	QC Check
Naphthalene-d8					
Naphthalene	1.117	1.063	4.8%	0.700	Pass
Acenaphthene-d10					
Acenaphthylene	2.035	1.983	2.6%	1.300	Pass
Acenaphthene	1.202	1.122	6.7%	0.800	Pass
Fluorene-d10				SS	
Fluorene	1.276	1.196	6.3%	0.900	Pass
Phenanthrene-d10					
Phenanthrene	1.155	1.117	3.3%	0.700	Pass
Anthracene	1.282	1.205	6.0%	0.700	Pass
Fluoranthene-d10				FS	
Fluoranthene	1.219	1.164	4.5%	0.600	Pass
Pyrene-d10				SS	
Pyrene	1.255	1.195	4.8%	0.600	Pass
Chrysene-d12					
Benzo(a)anthracene	1.348	1.388	3.0%	0.800	Pass
Chrysene	1.364	1.355	0.7%	0.700	Pass
Perylene-d12					
Benzo[b]fluoranthene	1.177	1.223	3.9%	0.700	Pass
Benzo[k]fluoranthene	1.272	1.361	7.0%	0.700	Pass
Benzo[a]pyrene-d12				FS	
Benzo[a]pyrene	1.095	1.128	3.0%	0.700	Pass
Indeno[1,2,3-cd]pyrene	1.112	1.080	2.9%	0.500	Pass
Dibenz[a,h]anthracene	1.105	1.046	5.4%	0.400	Pass
Benzo[g,h,i]perylene	1.131	1.113	1.6%	0.500	Pass

FS = Field Spike

SS = Surrogate Spike

LABORATORY REPORT

August 1, 2013

Karen Mordock
CH2M Hill
1717 Arch Street, Suite 4400
Philadelphia, PA 19103

RE: Pfizer Ambient Air Monitoring

Dear Karen:

Your report number P1204450 has been amended for the samples submitted to our laboratory on October 26, 2012. The Privileged and Confidential water mark has been removed from all of the report pages. The revised pages have been indicated by the "Revised Page" footer located at the bottom right of the page.

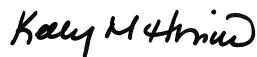
All analyses were performed according to our laboratory's NELAP and DoD-ELAP-approved quality assurance program. The test results meet requirements of the current NELAP and DoD-ELAP standards, where applicable, and except as noted in the laboratory case narrative provided. For a specific list of NELAP and DoD-ELAP-accredited analytes, refer to the certifications section at www.caslab.com. Results are intended to be considered in their entirety and apply only to the samples analyzed and reported herein.

Columbia Analytical Services, Inc. dba ALS Environmental (ALS) is certified by the California Department of Health Services, NELAP Laboratory Certificate No. 02115CA; Arizona Department of Health Services, Certificate No. AZ0694; Florida Department of Health, NELAP Certification E871020; New Jersey Department of Environmental Protection, NELAP Laboratory Certification ID #CA009; New York State Department of Health, NELAP NY Lab ID No: 11221; Oregon Environmental Laboratory Accreditation Program, NELAP ID: CA200007; The American Industrial Hygiene Association, Laboratory #101661; United States Department of Defense Environmental Laboratory Accreditation Program (DoD-ELAP), Certificate No. L11-203; Pennsylvania Registration No. 68-03307; TX Commission of Environmental Quality, NELAP ID T104704413-12-3; Minnesota Department of Health, NELAP Certificate No. 362188; Washington State Department of Ecology, ELAP Lab ID: C946, State of Utah Department of Health, NELAP Certificate No. CA01527Z012-Z; Los Angeles Department of Building and Safety, Approval No: TA00001. Each of the certifications listed above have an explicit Scope of Accreditation that applies to specific matrices/methods/analytes; therefore, please contact me for information corresponding to a particular certification.

If you have any questions, please call me at (805) 526-7161.

Respectfully submitted,

ALS | Environmental



By Kelly Horiuchi at 1:28 pm, Aug 01, 2013

Kelly Horiuchi
Laboratory Director

Client: CH2M Hill
Project: Pfizer Ambient Air Monitoring

Service Request No: P1204450

CASE NARRATIVE

The samples were received intact under chain of custody on October 26, 2012 and were stored in accordance with the analytical method requirements. Please refer to the sample acceptance check form for additional information. The results reported herein are applicable only to the condition of the samples at the time of sample receipt.

Volatile Organic Compound Analysis

The samples were analyzed for volatile organic compounds in accordance with EPA Method TO-15 from the Compendium of Methods for the Determination of Toxic Organic Compounds in Ambient Air, Second Edition (EPA/625/R-96/010b), January, 1999. The analytical system was comprised of a gas chromatograph / mass spectrometer (GC/MS) interfaced to a whole-air preconcentrator.

The Relative Percent Difference (RPD) criterion was exceeded for the replicate analysis of Chloromethane in sample "PZAA-P4-102412". However, analyte concentrations close to the Method Reporting Limit (MRL) may not be subject to the same precision criteria as results derived from measurements higher in the calibration range for the method. The magnitude of error may increase as the concentrations get closer to the reporting limit; therefore, the reported precision may be unrealistically large.

The results of analyses are given in the attached laboratory report. All results are intended to be considered in their entirety, and Columbia Analytical Services, Inc. dba ALS Environmental (ALS) is not responsible for utilization of less than the complete report.

Use of Columbia Analytical Services, Inc. dba ALS Environmental (ALS)'s Name. Client shall not use ALS's name or trademark in any marketing or reporting materials, press releases or in any other manner ("Materials") whatsoever and shall not attribute to ALS any test result, tolerance or specification derived from ALS's data ("Attribution") without ALS's prior written consent, which may be withheld by ALS for any reason in its sole discretion. To request ALS's consent, Client shall provide copies of the proposed Materials or Attribution and describe in writing Client's proposed use of such Materials or Attribution. If ALS has not provided written approval of the Materials or Attribution within ten (10) days of receipt from Client, Client's request to use ALS's name or trademark in any Materials or Attribution shall be deemed denied. ALS may, in its discretion, reasonably charge Client for its time in reviewing Materials or Attribution requests. Client acknowledges and agrees that the unauthorized use of ALS's name or trademark may cause ALS to incur irreparable harm for which the recovery of money damages will be inadequate. Accordingly, Client acknowledges and agrees that a violation shall justify preliminary injunctive relief. For questions contact the laboratory.

DETAIL SUMMARY REPORT

Client: CH2M Hill
 Project ID: Pfizer Ambient Air Monitoring

Service Request: P1204450

Date Received: 10/26/2012
 Time Received: 09:40


 TO-15 - VOC Cans

Client Sample ID	Lab Code	Matrix	Date Collected	Time Collected	Container ID	Pi1 (psig)	Pf1 (psig)	
PZAA-P1-102412	P1204450-001	Air	10/24/2012	12:24	AC01836	-1.66	3.50	X
PZAA-P2-102412	P1204450-002	Air	10/24/2012	16:10	AC01227	-2.30	3.55	X
PZAA-P3-102412	P1204450-003	Air	10/24/2012	15:57	AC01828	-2.64	3.50	X
PZAA-P4-102412	P1204450-004	Air	10/24/2012	15:14	AC01811	-3.28	3.50	X
PZAA-P5-102412	P1204450-005	Air	10/24/2012	14:53	AC00426	-2.88	3.52	X
PZAA-P6-102412	P1204450-006	Air	10/24/2012	15:00	AC00781	-2.86	3.50	X
PZAA-P7-102412	P1204450-007	Air	10/24/2012	14:43	AC01328	-2.47	3.50	X
PZAA-P8-102412	P1204450-008	Air	10/24/2012	14:25	AC00720	-2.96	3.51	X
PZAA-C1-102412	P1204450-009	Air	10/24/2012	15:32	AC00596	-2.72	3.50	X
PZAA-C2-102412	P1204450-010	Air	10/24/2012	15:36	AC01865	-2.89	3.58	X
PZAA-C3-102412	P1204450-011	Air	10/24/2012	15:21	AC01559	-3.24	3.55	X
PZAA-C4-102412-D	P1204450-012	Air	10/24/2012	15:43	AC01472	-2.61	3.52	X
PZAA-C3-102412-D	P1204450-013	Air	10/24/2012	15:21	AC01168	-1.01	3.56	X

2655 Park Center Drive, Suite A
 Simi Valley, California 93065
 Phone (805) 526-7161
 Fax (805) 526-7270

Requested Turnaround Time in Business Days (Surcharges) please circle							
1 Day (100%) 2 Day (75%) 3 Day (50%) 4 Day (35%) 5 Day (25%) 10 Day-Standard							

Project Name	<u>Paren Ambient Air Monitoring</u>
Project Number	

Company Name & Address (Reporting Information)

 1717 Arch St. Ste 4400
 Philadelphia PA 19103
 Project Manager
Karen Mordock

Phone

 215.695.0198
 Fax: 215.640.9212

Email Address for Result Reporting

Karen.Mordock@chem.com

P.O. # / Billing Information

PO-15

 CAS Project No.
91204450

 CAS Contact:
K. Horvuchi

Analysis Method

 Comments
 e.g. Actual
 Preservative or
 specific instructions

 Sampler (Print & Sign)
Leslie Bachler

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Revised Page

 Client Sample ID
 Laboratory ID Number
 Date Collected
 Time Collected
 (Bar code # - AC, SC, etc.)

 Flow Controller ID
 (Bar code #- FC #)
 Start Pressure
 "HG
 End Pressure
 "Hg/sig
 Canister Volume

TO-15

 Project Requirements
 (MRLs, QAPP)

PZAA-P1-102412	①-1.43	10/24/12	1224	AC018336	FCA00310	30.15	3.52"Hy	6L	X	Beginning
PZAA-P2-102412	②-2.12	10/24/12	1610	AC01227	FCA00571	29.88	5.11"	6L	X	+ End
PZAA-P3-102412	③-2.45	10/24/12	1557	Ac018328	FCA00103	30.08	5.57"	6L	X	Pressures
PZAA-P4-102412	④-3.04	10/24/12	1514	AC01811	FCA00520	30.15	6.90	6L	X	Flow
PZAA-P5-102412	⑤-2.69	10/24/12	1453	AC00426	FCA00245	30.15	6.23	6L	X	With
PZAA-P6-102412	⑥-2.10	10/24/12	1500	AC006781	FCA00031	30.21	6.33	6L	X	Digital
PZAA-P7-102412	⑦-2.28	10/24/12	1443	AC01328	FCA0005	30.19	5.26	6L	X	Pressure
PZAA-P8-102412	⑧-2.84	10/24/12	1425	AC00720	FCA00329	30.19	5.92	6L	X	Average
PZAA-C1-102412	⑨-2.54	10/24/12	1532	AC00596	FCA00215	30.13	5.81*	6L	X	DVG
PZAA-C2-102412	⑩-2.78	10/24/12	1536	AC01865	FCA00221	30.16	6.22*	6L	X	00127
PZAA-C3-102412	⑪-3.05	10/24/12	1521	AC01559	FCA00255	30.19	6.70	6L	X	*
PZAA-C4-102412	⑫-2.44	10/24/12	1543	AC01438	FCA00318	30.15	5.70*	6L	X	DR 600089
PZAA-C5-102412-D	⑬-0.79	10/24/12	1521	AC01722	FCA00113	30.26	7.09*	6L	X	
			11445			1148				

Report Tier Levels - please select

 Tier I - Results (Default if not specified)
 Tier II (Results + QC Summaries)

Tier III (Results + QC & Calibration Summaries)

Tier IV (Data Validation Package)

10% Surcharge

 EDD required Yes / No
 Type: SOW

 Project Requirements
 (MRLs, QAPP)

 Project Requirements
 (MRLs, QAPP)

Relinquished by: (Signature)

JHG

Date:

10/24

Time:

1645

Received by: (Signature)

Collector

Date:

10/24

Time:

1645

Received by: (Signature)

JHG

Sample Acceptance Check Form

 Client: CH2M Hill

 Work order: P1204450

 Project: Pfizer Ambient Air Monitoring

 Sample(s) received on: 10/26/12

 Date opened: 10/26/12

 by: MZAMORA

Note: This form is used for all samples received by CAS. The use of this form for custody seals is strictly meant to indicate presence/absence and not as an indication of compliance or nonconformity. Thermal preservation and pH will only be evaluated either at the request of the client and/or as required by the method/SOP.

Yes **No** **N/A**

- 1 Were **sample containers** properly marked with client sample ID?
- 2 Container(s) **supplied by CAS?**
- 3 Did **sample containers** arrive in good condition?
- 4 Were **chain-of-custody** papers used and filled out?
- 5 Did **sample container labels** and/or tags agree with custody papers?
- 6 Was **sample volume** received adequate for analysis?
- 7 Are samples within specified holding times?
- 8 Was proper **temperature** (thermal preservation) of cooler at receipt adhered to?

- 9 Was a **trip blank** received?
- 10 Were **custody seals** on outside of cooler/Box?

 Location of seal(s)? Top of box, covering opening.

 Sealing Lid?

 Were signature and date included?

 Were seals intact?

 Were custody seals on outside of sample container?

 Location of seal(s)?

 Sealing Lid?

 Were signature and date included?

 Were seals intact?

 11 Do containers have appropriate **preservation**, according to method/SOP or Client specified information?

 Is there a client indication that the submitted samples are **pH** preserved?

 Were **VOA vials** checked for presence/absence of air bubbles?

 Does the client/method/SOP require that the analyst check the sample pH and if necessary alter it?

 12 **Tubes:** Are the tubes capped and intact?

 Do they contain moisture?

 13 **Badges:** Are the badges properly capped and intact?

 Are dual bed badges separated and individually capped and intact?

Lab Sample ID	Container Description	Required pH *	Received pH	Adjusted pH	VOA Headspace (Presence/Absence)	Receipt / Preservation Comments
P1204450-001.01	6.0 L Ambient Can					
P1204450-002.01	6.0 L Ambient Can					
P1204450-003.01	6.0 L Ambient Can					
P1204450-004.01	6.0 L Ambient Can					
P1204450-005.01	6.0 L Ambient Can					
P1204450-006.01	6.0 L Ambient Can					
P1204450-007.01	6.0 L Ambient Can					
P1204450-008.01	6.0 L Ambient Can					

Explain any discrepancies: (include lab sample ID numbers): _____

Sample Acceptance Check Form

Client: CH2M Hill

Work order: P1204450

Project: Pfizer Ambient Air Monitoring

Sample(s) received on: 10/26/12

: 10/26/12 hv:

Sample(s) received on: 10/26/11

Date opened: 10/26/12

by: MZAMORA

Explain any discrepancies: (include lab sample ID numbers):

RESULTS OF ANALYSIS

Page 1 of 3

Client: CH2M Hill
Client Sample ID: PZAA-P1-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
CAS Sample ID: P1204450-001

Test Code: EPA TO-15 Date Collected: 10/24/12
Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/26/12
Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC01836

Initial Pressure (psig): -1.66 Final Pressure (psig): 3.50

Canister Dilution Factor: 1.40

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	4.2	0.70	2.4	0.41	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.0	0.70	0.41	0.14	
74-87-3	Chloromethane	0.52	0.28	0.25	0.14	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.70	ND	0.10	
75-01-4	Vinyl Chloride	ND	0.14	ND	0.055	
106-99-0	1,3-Butadiene	0.41	0.28	0.18	0.13	
74-83-9	Bromomethane	ND	0.14	ND	0.036	
75-00-3	Chloroethane	ND	0.14	ND	0.053	
64-17-5	Ethanol	45	7.0	24	3.7	
75-05-8	Acetonitrile	0.82	0.70	0.49	0.42	
107-02-8	Acrolein	6.2	2.8	2.7	1.2	
67-64-1	Acetone	170	7.0	72	2.9	
75-69-4	Trichlorofluoromethane	2.4	0.14	0.43	0.025	
67-63-0	2-Propanol (Isopropyl Alcohol)	12	7.0	4.7	2.8	
107-13-1	Acrylonitrile	ND	0.70	ND	0.32	
75-35-4	1,1-Dichloroethene	ND	0.14	ND	0.035	
75-09-2	Methylene Chloride	2.0	0.70	0.58	0.20	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.14	ND	0.045	
76-13-1	Trichlorotrifluoroethane	0.50	0.14	0.065	0.018	
75-15-0	Carbon Disulfide	ND	7.0	ND	2.2	
156-60-5	trans-1,2-Dichloroethene	ND	0.14	ND	0.035	
75-34-3	1,1-Dichloroethane	ND	0.14	ND	0.035	
1634-04-4	Methyl tert-Butyl Ether	ND	0.14	ND	0.039	
108-05-4	Vinyl Acetate	ND	7.0	ND	2.0	
78-93-3	2-Butanone (MEK)	12	7.0	3.9	2.4	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 2 of 3

Client: CH2M Hill
Client Sample ID: PZAA-P1-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
CAS Sample ID: P1204450-001

Test Code: EPA TO-15 Date Collected: 10/24/12
Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/26/12
Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC01836

Initial Pressure (psig): -1.66 Final Pressure (psig): 3.50

Canister Dilution Factor: 1.40

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.14	ND	0.035	
141-78-6	Ethyl Acetate	4.2	1.4	1.2	0.39	
110-54-3	n-Hexane	1.8	0.70	0.50	0.20	
67-66-3	Chloroform	0.18	0.14	0.036	0.029	
109-99-9	Tetrahydrofuran (THF)	ND	0.70	ND	0.24	
107-06-2	1,2-Dichloroethane	0.31	0.14	0.077	0.035	
71-55-6	1,1,1-Trichloroethane	ND	0.14	ND	0.026	
71-43-2	Benzene	2.4	0.14	0.75	0.044	
56-23-5	Carbon Tetrachloride	0.43	0.14	0.068	0.022	
110-82-7	Cyclohexane	ND	1.4	ND	0.41	
78-87-5	1,2-Dichloropropane	ND	0.14	ND	0.030	
75-27-4	Bromodichloromethane	ND	0.14	ND	0.021	
79-01-6	Trichloroethene	ND	0.14	ND	0.026	
123-91-1	1,4-Dioxane	ND	0.70	ND	0.19	
80-62-6	Methyl Methacrylate	ND	1.4	ND	0.34	
142-82-5	n-Heptane	1.4	0.70	0.35	0.17	
10061-01-5	cis-1,3-Dichloropropene	ND	0.70	ND	0.15	
108-10-1	4-Methyl-2-pentanone	ND	0.70	ND	0.17	
10061-02-6	trans-1,3-Dichloropropene	ND	0.70	ND	0.15	
79-00-5	1,1,2-Trichloroethane	ND	0.14	ND	0.026	
108-88-3	Toluene	5.5	0.70	1.5	0.19	
591-78-6	2-Hexanone	1.4	0.70	0.34	0.17	
124-48-1	Dibromochloromethane	ND	0.14	ND	0.016	
106-93-4	1,2-Dibromoethane	ND	0.14	ND	0.018	
123-86-4	n-Butyl Acetate	ND	0.70	ND	0.15	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P1-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
CAS Sample ID: P1204450-001

Test Code: EPA TO-15 Date Collected: 10/24/12
Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/26/12
Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC01836

Initial Pressure (psig): -1.66 Final Pressure (psig): 3.50

Canister Dilution Factor: 1.40

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	1.0	0.70	0.22	0.15	
127-18-4	Tetrachloroethene	0.29	0.14	0.042	0.021	
108-90-7	Chlorobenzene	ND	0.14	ND	0.030	
100-41-4	Ethylbenzene	0.87	0.70	0.20	0.16	
179601-23-1	m,p-Xylenes	2.7	0.70	0.62	0.16	
75-25-2	Bromoform	ND	0.70	ND	0.068	
100-42-5	Styrene	0.71	0.70	0.17	0.16	
95-47-6	o-Xylene	ND	0.70	ND	0.16	
111-84-2	n-Nonane	ND	0.70	ND	0.13	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.14	ND	0.020	
98-82-8	Cumene	ND	0.70	ND	0.14	
80-56-8	alpha-Pinene	1.6	0.70	0.28	0.13	
103-65-1	n-Propylbenzene	ND	0.70	ND	0.14	
622-96-8	4-Ethyltoluene	ND	0.70	ND	0.14	
108-67-8	1,3,5-Trimethylbenzene	ND	0.70	ND	0.14	
95-63-6	1,2,4-Trimethylbenzene	ND	0.70	ND	0.14	
100-44-7	Benzyl Chloride	ND	0.70	ND	0.14	
541-73-1	1,3-Dichlorobenzene	ND	0.14	ND	0.023	
106-46-7	1,4-Dichlorobenzene	0.35	0.14	0.058	0.023	
95-50-1	1,2-Dichlorobenzene	ND	0.14	ND	0.023	
5989-27-5	d-Limonene	1.2	0.70	0.22	0.13	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.70	ND	0.072	
120-82-1	1,2,4-Trichlorobenzene	ND	0.70	ND	0.094	
91-20-3	Naphthalene	ND	0.70	ND	0.13	
87-68-3	Hexachlorobutadiene	ND	0.70	ND	0.066	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P2-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
CAS Sample ID: P1204450-002

Test Code: EPA TO-15 Date Collected: 10/24/12
Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC01227

Initial Pressure (psig): -2.30 Final Pressure (psig): 3.55

Canister Dilution Factor: 1.47

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	15	0.74	8.8	0.43	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.1	0.74	0.43	0.15	
74-87-3	Chloromethane	0.67	0.29	0.33	0.14	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.74	ND	0.11	
75-01-4	Vinyl Chloride	ND	0.15	ND	0.058	
106-99-0	1,3-Butadiene	0.61	0.29	0.27	0.13	
74-83-9	Bromomethane	ND	0.15	ND	0.038	
75-00-3	Chloroethane	ND	0.15	ND	0.056	
64-17-5	Ethanol	59	7.4	31	3.9	
75-05-8	Acetonitrile	1.3	0.74	0.75	0.44	
107-02-8	Acrolein	13	2.9	5.8	1.3	
67-64-1	Acetone	330	7.4	140	3.1	
75-69-4	Trichlorofluoromethane	1.3	0.15	0.24	0.026	
67-63-0	2-Propanol (Isopropyl Alcohol)	74	7.4	30	3.0	
107-13-1	Acrylonitrile	ND	0.74	ND	0.34	
75-35-4	1,1-Dichloroethene	ND	0.15	ND	0.037	
75-09-2	Methylene Chloride	2.3	0.74	0.67	0.21	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.15	ND	0.047	
76-13-1	Trichlorotrifluoroethane	0.50	0.15	0.066	0.019	
75-15-0	Carbon Disulfide	ND	7.4	ND	2.4	
156-60-5	trans-1,2-Dichloroethene	ND	0.15	ND	0.037	
75-34-3	1,1-Dichloroethane	ND	0.15	ND	0.036	
1634-04-4	Methyl tert-Butyl Ether	ND	0.15	ND	0.041	
108-05-4	Vinyl Acetate	ND	7.4	ND	2.1	
78-93-3	2-Butanone (MEK)	21	7.4	7.1	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P2-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
CAS Sample ID: P1204450-002

Test Code: EPA TO-15 Date Collected: 10/24/12
Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC01227

Initial Pressure (psig): -2.30 Final Pressure (psig): 3.55

Canister Dilution Factor: 1.47

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.15	ND	0.037	
141-78-6	Ethyl Acetate	4.9	1.5	1.4	0.41	
110-54-3	n-Hexane	1.8	0.74	0.50	0.21	
67-66-3	Chloroform	0.28	0.15	0.057	0.030	
109-99-9	Tetrahydrofuran (THF)	ND	0.74	ND	0.25	
107-06-2	1,2-Dichloroethane	0.53	0.15	0.13	0.036	
71-55-6	1,1,1-Trichloroethane	ND	0.15	ND	0.027	
71-43-2	Benzene	2.6	0.15	0.81	0.046	
56-23-5	Carbon Tetrachloride	0.38	0.15	0.060	0.023	
110-82-7	Cyclohexane	ND	1.5	ND	0.43	
78-87-5	1,2-Dichloropropane	ND	0.15	ND	0.032	
75-27-4	Bromodichloromethane	ND	0.15	ND	0.022	
79-01-6	Trichloroethene	ND	0.15	ND	0.027	
123-91-1	1,4-Dioxane	ND	0.74	ND	0.20	
80-62-6	Methyl Methacrylate	ND	1.5	ND	0.36	
142-82-5	n-Heptane	1.6	0.74	0.39	0.18	
10061-01-5	cis-1,3-Dichloropropene	ND	0.74	ND	0.16	
108-10-1	4-Methyl-2-pentanone	ND	0.74	ND	0.18	
10061-02-6	trans-1,3-Dichloropropene	ND	0.74	ND	0.16	
79-00-5	1,1,2-Trichloroethane	ND	0.15	ND	0.027	
108-88-3	Toluene	5.5	0.74	1.5	0.20	
591-78-6	2-Hexanone	1.9	0.74	0.45	0.18	
124-48-1	Dibromochloromethane	ND	0.15	ND	0.017	
106-93-4	1,2-Dibromoethane	ND	0.15	ND	0.019	
123-86-4	n-Butyl Acetate	0.74	0.74	0.16	0.15	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P2-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
CAS Sample ID: P1204450-002

Test Code: EPA TO-15 Date Collected: 10/24/12
Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC01227

Initial Pressure (psig): -2.30 Final Pressure (psig): 3.55

Canister Dilution Factor: 1.47

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	1.0	0.74	0.22	0.16	
127-18-4	Tetrachloroethene	0.19	0.15	0.027	0.022	
108-90-7	Chlorobenzene	ND	0.15	ND	0.032	
100-41-4	Ethylbenzene	0.91	0.74	0.21	0.17	
179601-23-1	m,p-Xylenes	2.9	0.74	0.66	0.17	
75-25-2	Bromoform	ND	0.74	ND	0.071	
100-42-5	Styrene	ND	0.74	ND	0.17	
95-47-6	o-Xylene	ND	0.74	ND	0.17	
111-84-2	n-Nonane	ND	0.74	ND	0.14	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.15	ND	0.021	
98-82-8	Cumene	ND	0.74	ND	0.15	
80-56-8	alpha-Pinene	2.0	0.74	0.35	0.13	
103-65-1	n-Propylbenzene	ND	0.74	ND	0.15	
622-96-8	4-Ethyltoluene	ND	0.74	ND	0.15	
108-67-8	1,3,5-Trimethylbenzene	ND	0.74	ND	0.15	
95-63-6	1,2,4-Trimethylbenzene	ND	0.74	ND	0.15	
100-44-7	Benzyl Chloride	ND	0.74	ND	0.14	
541-73-1	1,3-Dichlorobenzene	ND	0.15	ND	0.024	
106-46-7	1,4-Dichlorobenzene	0.31	0.15	0.052	0.024	
95-50-1	1,2-Dichlorobenzene	ND	0.15	ND	0.024	
5989-27-5	d-Limonene	1.4	0.74	0.26	0.13	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.74	ND	0.076	
120-82-1	1,2,4-Trichlorobenzene	ND	0.74	ND	0.099	
91-20-3	Naphthalene	ND	0.74	ND	0.14	
87-68-3	Hexachlorobutadiene	ND	0.74	ND	0.069	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P3-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
 CAS Sample ID: P1204450-003

Test Code: EPA TO-15 Date Collected: 10/24/12
 Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
 Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
 Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
 Test Notes:
 Container ID: AC01828

Initial Pressure (psig): -2.64 Final Pressure (psig): 3.50

Canister Dilution Factor: 1.51

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	6.0	0.76	3.5	0.44	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.0	0.76	0.40	0.15	
74-87-3	Chloromethane	0.59	0.30	0.29	0.15	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.76	ND	0.11	
75-01-4	Vinyl Chloride	ND	0.15	ND	0.059	
106-99-0	1,3-Butadiene	0.48	0.30	0.22	0.14	
74-83-9	Bromomethane	ND	0.15	ND	0.039	
75-00-3	Chloroethane	ND	0.15	ND	0.057	
64-17-5	Ethanol	59	7.6	31	4.0	
75-05-8	Acetonitrile	0.98	0.76	0.58	0.45	
107-02-8	Acrolein	9.3	3.0	4.1	1.3	
67-64-1	Acetone	210	7.6	87	3.2	
75-69-4	Trichlorofluoromethane	1.3	0.15	0.23	0.027	
67-63-0	2-Propanol (Isopropyl Alcohol)	15	7.6	6.3	3.1	
107-13-1	Acrylonitrile	ND	0.76	ND	0.35	
75-35-4	1,1-Dichloroethene	ND	0.15	ND	0.038	
75-09-2	Methylene Chloride	5.2	0.76	1.5	0.22	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.15	ND	0.048	
76-13-1	Trichlorotrifluoroethane	0.48	0.15	0.063	0.020	
75-15-0	Carbon Disulfide	ND	7.6	ND	2.4	
156-60-5	trans-1,2-Dichloroethene	ND	0.15	ND	0.038	
75-34-3	1,1-Dichloroethane	ND	0.15	ND	0.037	
1634-04-4	Methyl tert-Butyl Ether	0.66	0.15	0.18	0.042	
108-05-4	Vinyl Acetate	ND	7.6	ND	2.1	
78-93-3	2-Butanone (MEK)	26	7.6	9.0	2.6	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P3-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
CAS Sample ID: P1204450-003

Test Code: EPA TO-15 Date Collected: 10/24/12
Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC01828

Initial Pressure (psig): -2.64 Final Pressure (psig): 3.50

Canister Dilution Factor: 1.51

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.15	ND	0.038	
141-78-6	Ethyl Acetate	6.1	1.5	1.7	0.42	
110-54-3	n-Hexane	11	0.76	3.0	0.21	
67-66-3	Chloroform	0.19	0.15	0.040	0.031	
109-99-9	Tetrahydrofuran (THF)	7.5	0.76	2.6	0.26	
107-06-2	1,2-Dichloroethane	5.6	0.15	1.4	0.037	
71-55-6	1,1,1-Trichloroethane	ND	0.15	ND	0.028	
71-43-2	Benzene	3.5	0.15	1.1	0.047	
56-23-5	Carbon Tetrachloride	0.42	0.15	0.066	0.024	
110-82-7	Cyclohexane	ND	1.5	ND	0.44	
78-87-5	1,2-Dichloropropane	2.3	0.15	0.49	0.033	
75-27-4	Bromodichloromethane	ND	0.15	ND	0.023	
79-01-6	Trichloroethene	ND	0.15	ND	0.028	
123-91-1	1,4-Dioxane	ND	0.76	ND	0.21	
80-62-6	Methyl Methacrylate	ND	1.5	ND	0.37	
142-82-5	n-Heptane	5.1	0.76	1.2	0.18	
10061-01-5	cis-1,3-Dichloropropene	ND	0.76	ND	0.17	
108-10-1	4-Methyl-2-pentanone	3.4	0.76	0.82	0.18	
10061-02-6	trans-1,3-Dichloropropene	ND	0.76	ND	0.17	
79-00-5	1,1,2-Trichloroethane	ND	0.15	ND	0.028	
108-88-3	Toluene	51	0.76	13	0.20	
591-78-6	2-Hexanone	ND	0.76	ND	0.18	
124-48-1	Dibromochloromethane	ND	0.15	ND	0.018	
106-93-4	1,2-Dibromoethane	ND	0.15	ND	0.020	
123-86-4	n-Butyl Acetate	1.3	0.76	0.27	0.16	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P3-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
CAS Sample ID: P1204450-003

Test Code: EPA TO-15 Date Collected: 10/24/12
Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC01828

Initial Pressure (psig): -2.64 Final Pressure (psig): 3.50

Canister Dilution Factor: 1.51

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	5.9	0.76	1.3	0.16	
127-18-4	Tetrachloroethene	0.81	0.15	0.12	0.022	
108-90-7	Chlorobenzene	0.76	0.15	0.16	0.033	
100-41-4	Ethylbenzene	7.5	0.76	1.7	0.17	
179601-23-1	m,p-Xylenes	6.0	0.76	1.4	0.17	
75-25-2	Bromoform	ND	0.76	ND	0.073	
100-42-5	Styrene	20	0.76	4.7	0.18	
95-47-6	o-Xylene	7.4	0.76	1.7	0.17	
111-84-2	n-Nonane	7.2	0.76	1.4	0.14	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.15	ND	0.022	
98-82-8	Cumene	6.4	0.76	1.3	0.15	
80-56-8	alpha-Pinene	5.0	0.76	0.91	0.14	
103-65-1	n-Propylbenzene	ND	0.76	ND	0.15	
622-96-8	4-Ethyltoluene	ND	0.76	ND	0.15	
108-67-8	1,3,5-Trimethylbenzene	ND	0.76	ND	0.15	
95-63-6	1,2,4-Trimethylbenzene	2.2	0.76	0.46	0.15	
100-44-7	Benzyl Chloride	ND	0.76	ND	0.15	
541-73-1	1,3-Dichlorobenzene	ND	0.15	ND	0.025	
106-46-7	1,4-Dichlorobenzene	0.31	0.15	0.052	0.025	
95-50-1	1,2-Dichlorobenzene	ND	0.15	ND	0.025	
5989-27-5	d-Limonene	5.0	0.76	0.89	0.14	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.76	ND	0.078	
120-82-1	1,2,4-Trichlorobenzene	ND	0.76	ND	0.10	
91-20-3	Naphthalene	2.2	0.76	0.42	0.14	
87-68-3	Hexachlorobutadiene	ND	0.76	ND	0.071	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P4-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
CAS Sample ID: P1204450-004

Test Code: EPA TO-15 Date Collected: 10/24/12
Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC01811

Initial Pressure (psig): -3.28 Final Pressure (psig): 3.50

Canister Dilution Factor: 1.59

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	3.5	0.80	2.0	0.46	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.1	0.80	0.43	0.16	
74-87-3	Chloromethane	0.57	0.32	0.27	0.15	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.80	ND	0.11	
75-01-4	Vinyl Chloride	ND	0.16	ND	0.062	
106-99-0	1,3-Butadiene	0.40	0.32	0.18	0.14	
74-83-9	Bromomethane	ND	0.16	ND	0.041	
75-00-3	Chloroethane	ND	0.16	ND	0.060	
64-17-5	Ethanol	33	8.0	17	4.2	
75-05-8	Acetonitrile	1.0	0.80	0.62	0.47	
107-02-8	Acrolein	6.3	3.2	2.7	1.4	
67-64-1	Acetone	120	8.0	52	3.3	
75-69-4	Trichlorofluoromethane	1.2	0.16	0.22	0.028	
67-63-0	2-Propanol (Isopropyl Alcohol)	13	8.0	5.3	3.2	
107-13-1	Acrylonitrile	ND	0.80	ND	0.37	
75-35-4	1,1-Dichloroethene	ND	0.16	ND	0.040	
75-09-2	Methylene Chloride	2.8	0.80	0.81	0.23	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.16	ND	0.051	
76-13-1	Trichlorotrifluoroethane	0.52	0.16	0.068	0.021	
75-15-0	Carbon Disulfide	ND	8.0	ND	2.6	
156-60-5	trans-1,2-Dichloroethene	ND	0.16	ND	0.040	
75-34-3	1,1-Dichloroethane	ND	0.16	ND	0.039	
1634-04-4	Methyl tert-Butyl Ether	0.22	0.16	0.061	0.044	
108-05-4	Vinyl Acetate	ND	8.0	ND	2.3	
78-93-3	2-Butanone (MEK)	8.9	8.0	3.0	2.7	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P4-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
 CAS Sample ID: P1204450-004

Test Code: EPA TO-15 Date Collected: 10/24/12
 Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
 Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
 Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
 Test Notes:
 Container ID: AC01811

Initial Pressure (psig): -3.28 Final Pressure (psig): 3.50

Canister Dilution Factor: 1.59

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.16	ND	0.040	
141-78-6	Ethyl Acetate	7.1	1.6	2.0	0.44	
110-54-3	n-Hexane	1.7	0.80	0.48	0.23	
67-66-3	Chloroform	0.23	0.16	0.047	0.033	
109-99-9	Tetrahydrofuran (THF)	ND	0.80	ND	0.27	
107-06-2	1,2-Dichloroethane	0.38	0.16	0.094	0.039	
71-55-6	1,1,1-Trichloroethane	ND	0.16	ND	0.029	
71-43-2	Benzene	2.1	0.16	0.65	0.050	
56-23-5	Carbon Tetrachloride	0.44	0.16	0.069	0.025	
110-82-7	Cyclohexane	ND	1.6	ND	0.46	
78-87-5	1,2-Dichloropropane	ND	0.16	ND	0.034	
75-27-4	Bromodichloromethane	ND	0.16	ND	0.024	
79-01-6	Trichloroethene	ND	0.16	ND	0.030	
123-91-1	1,4-Dioxane	ND	0.80	ND	0.22	
80-62-6	Methyl Methacrylate	ND	1.6	ND	0.39	
142-82-5	n-Heptane	1.2	0.80	0.30	0.19	
10061-01-5	cis-1,3-Dichloropropene	ND	0.80	ND	0.18	
108-10-1	4-Methyl-2-pentanone	ND	0.80	ND	0.19	
10061-02-6	trans-1,3-Dichloropropene	ND	0.80	ND	0.18	
79-00-5	1,1,2-Trichloroethane	ND	0.16	ND	0.029	
108-88-3	Toluene	5.4	0.80	1.4	0.21	
591-78-6	2-Hexanone	0.82	0.80	0.20	0.19	
124-48-1	Dibromochloromethane	ND	0.16	ND	0.019	
106-93-4	1,2-Dibromoethane	ND	0.16	ND	0.021	
123-86-4	n-Butyl Acetate	ND	0.80	ND	0.17	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P4-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
CAS Sample ID: P1204450-004

Test Code: EPA TO-15 Date Collected: 10/24/12
Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC01811

Initial Pressure (psig): -3.28 Final Pressure (psig): 3.50

Canister Dilution Factor: 1.59

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.80	ND	0.17	
127-18-4	Tetrachloroethene	0.26	0.16	0.038	0.023	
108-90-7	Chlorobenzene	ND	0.16	ND	0.035	
100-41-4	Ethylbenzene	0.83	0.80	0.19	0.18	
179601-23-1	m,p-Xylenes	2.6	0.80	0.60	0.18	
75-25-2	Bromoform	ND	0.80	ND	0.077	
100-42-5	Styrene	ND	0.80	ND	0.19	
95-47-6	o-Xylene	ND	0.80	ND	0.18	
111-84-2	n-Nonane	ND	0.80	ND	0.15	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.16	ND	0.023	
98-82-8	Cumene	ND	0.80	ND	0.16	
80-56-8	alpha-Pinene	1.5	0.80	0.28	0.14	
103-65-1	n-Propylbenzene	ND	0.80	ND	0.16	
622-96-8	4-Ethyltoluene	ND	0.80	ND	0.16	
108-67-8	1,3,5-Trimethylbenzene	ND	0.80	ND	0.16	
95-63-6	1,2,4-Trimethylbenzene	ND	0.80	ND	0.16	
100-44-7	Benzyl Chloride	ND	0.80	ND	0.15	
541-73-1	1,3-Dichlorobenzene	ND	0.16	ND	0.026	
106-46-7	1,4-Dichlorobenzene	0.27	0.16	0.045	0.026	
95-50-1	1,2-Dichlorobenzene	ND	0.16	ND	0.026	
5989-27-5	d-Limonene	1.1	0.80	0.19	0.14	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.80	ND	0.082	
120-82-1	1,2,4-Trichlorobenzene	ND	0.80	ND	0.11	
91-20-3	Naphthalene	ND	0.80	ND	0.15	
87-68-3	Hexachlorobutadiene	ND	0.80	ND	0.075	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P5-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
CAS Sample ID: P1204450-005

Test Code: EPA TO-15 Date Collected: 10/24/12
Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC00426

Initial Pressure (psig): -2.88 Final Pressure (psig): 3.52

Canister Dilution Factor: 1.54

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	3.4	0.77	2.0	0.45	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.1	0.77	0.43	0.16	
74-87-3	Chloromethane	0.59	0.31	0.29	0.15	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.77	ND	0.11	
75-01-4	Vinyl Chloride	ND	0.15	ND	0.060	
106-99-0	1,3-Butadiene	0.50	0.31	0.23	0.14	
74-83-9	Bromomethane	ND	0.15	ND	0.040	
75-00-3	Chloroethane	ND	0.15	ND	0.058	
64-17-5	Ethanol	24	7.7	13	4.1	
75-05-8	Acetonitrile	0.84	0.77	0.50	0.46	
107-02-8	Acrolein	5.0	3.1	2.2	1.3	
67-64-1	Acetone	110	7.7	48	3.2	
75-69-4	Trichlorofluoromethane	1.3	0.15	0.23	0.027	
67-63-0	2-Propanol (Isopropyl Alcohol)	9.2	7.7	3.7	3.1	
107-13-1	Acrylonitrile	ND	0.77	ND	0.35	
75-35-4	1,1-Dichloroethene	ND	0.15	ND	0.039	
75-09-2	Methylene Chloride	2.7	0.77	0.78	0.22	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.15	ND	0.049	
76-13-1	Trichlorotrifluoroethane	0.54	0.15	0.070	0.020	
75-15-0	Carbon Disulfide	ND	7.7	ND	2.5	
156-60-5	trans-1,2-Dichloroethene	ND	0.15	ND	0.039	
75-34-3	1,1-Dichloroethane	ND	0.15	ND	0.038	
1634-04-4	Methyl tert-Butyl Ether	0.19	0.15	0.052	0.043	
108-05-4	Vinyl Acetate	ND	7.7	ND	2.2	
78-93-3	2-Butanone (MEK)	8.5	7.7	2.9	2.6	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P5-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
CAS Sample ID: P1204450-005

Test Code: EPA TO-15 Date Collected: 10/24/12
Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC00426

Initial Pressure (psig): -2.88 Final Pressure (psig): 3.52

Canister Dilution Factor: 1.54

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.15	ND	0.039	
141-78-6	Ethyl Acetate	6.8	1.5	1.9	0.43	
110-54-3	n-Hexane	1.6	0.77	0.46	0.22	
67-66-3	Chloroform	0.31	0.15	0.063	0.032	
109-99-9	Tetrahydrofuran (THF)	ND	0.77	ND	0.26	
107-06-2	1,2-Dichloroethane	0.26	0.15	0.064	0.038	
71-55-6	1,1,1-Trichloroethane	ND	0.15	ND	0.028	
71-43-2	Benzene	1.6	0.15	0.51	0.048	
56-23-5	Carbon Tetrachloride	0.45	0.15	0.071	0.024	
110-82-7	Cyclohexane	ND	1.5	ND	0.45	
78-87-5	1,2-Dichloropropane	ND	0.15	ND	0.033	
75-27-4	Bromodichloromethane	ND	0.15	ND	0.023	
79-01-6	Trichloroethene	ND	0.15	ND	0.029	
123-91-1	1,4-Dioxane	ND	0.77	ND	0.21	
80-62-6	Methyl Methacrylate	ND	1.5	ND	0.38	
142-82-5	n-Heptane	1.1	0.77	0.27	0.19	
10061-01-5	cis-1,3-Dichloropropene	ND	0.77	ND	0.17	
108-10-1	4-Methyl-2-pentanone	ND	0.77	ND	0.19	
10061-02-6	trans-1,3-Dichloropropene	ND	0.77	ND	0.17	
79-00-5	1,1,2-Trichloroethane	ND	0.15	ND	0.028	
108-88-3	Toluene	5.0	0.77	1.3	0.20	
591-78-6	2-Hexanone	0.96	0.77	0.23	0.19	
124-48-1	Dibromochloromethane	ND	0.15	ND	0.018	
106-93-4	1,2-Dibromoethane	ND	0.15	ND	0.020	
123-86-4	n-Butyl Acetate	0.86	0.77	0.18	0.16	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P5-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
CAS Sample ID: P1204450-005

Test Code: EPA TO-15 Date Collected: 10/24/12
 Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
 Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
 Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
 Test Notes:
 Container ID: AC00426

Initial Pressure (psig): -2.88 Final Pressure (psig): 3.52

Canister Dilution Factor: 1.54

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.77	ND	0.16	
127-18-4	Tetrachloroethene	0.37	0.15	0.055	0.023	
108-90-7	Chlorobenzene	ND	0.15	ND	0.033	
100-41-4	Ethylbenzene	0.84	0.77	0.19	0.18	
179601-23-1	m,p-Xylenes	2.8	0.77	0.64	0.18	
75-25-2	Bromoform	ND	0.77	ND	0.075	
100-42-5	Styrene	ND	0.77	ND	0.18	
95-47-6	o-Xylene	ND	0.77	ND	0.18	
111-84-2	n-Nonane	ND	0.77	ND	0.15	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.15	ND	0.022	
98-82-8	Cumene	ND	0.77	ND	0.16	
80-56-8	alpha-Pinene	1.4	0.77	0.25	0.14	
103-65-1	n-Propylbenzene	ND	0.77	ND	0.16	
622-96-8	4-Ethyltoluene	ND	0.77	ND	0.16	
108-67-8	1,3,5-Trimethylbenzene	ND	0.77	ND	0.16	
95-63-6	1,2,4-Trimethylbenzene	ND	0.77	ND	0.16	
100-44-7	Benzyl Chloride	ND	0.77	ND	0.15	
541-73-1	1,3-Dichlorobenzene	ND	0.15	ND	0.026	
106-46-7	1,4-Dichlorobenzene	0.29	0.15	0.049	0.026	
95-50-1	1,2-Dichlorobenzene	ND	0.15	ND	0.026	
5989-27-5	d-Limonene	1.4	0.77	0.25	0.14	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.77	ND	0.080	
120-82-1	1,2,4-Trichlorobenzene	ND	0.77	ND	0.10	
91-20-3	Naphthalene	ND	0.77	ND	0.15	
87-68-3	Hexachlorobutadiene	ND	0.77	ND	0.072	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P6-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
CAS Sample ID: P1204450-006

Test Code: EPA TO-15 Date Collected: 10/24/12
Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC00781

Initial Pressure (psig): -2.86 Final Pressure (psig): 3.50

Canister Dilution Factor: 1.54

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	4.4	0.77	2.6	0.45	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.1	0.77	0.42	0.16	
74-87-3	Chloromethane	0.60	0.31	0.29	0.15	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.77	ND	0.11	
75-01-4	Vinyl Chloride	ND	0.15	ND	0.060	
106-99-0	1,3-Butadiene	0.57	0.31	0.26	0.14	
74-83-9	Bromomethane	ND	0.15	ND	0.040	
75-00-3	Chloroethane	ND	0.15	ND	0.058	
64-17-5	Ethanol	32	7.7	17	4.1	
75-05-8	Acetonitrile	0.86	0.77	0.51	0.46	
107-02-8	Acrolein	6.2	3.1	2.7	1.3	
67-64-1	Acetone	160	7.7	66	3.2	
75-69-4	Trichlorofluoromethane	1.3	0.15	0.23	0.027	
67-63-0	2-Propanol (Isopropyl Alcohol)	9.4	7.7	3.8	3.1	
107-13-1	Acrylonitrile	ND	0.77	ND	0.35	
75-35-4	1,1-Dichloroethene	ND	0.15	ND	0.039	
75-09-2	Methylene Chloride	2.7	0.77	0.77	0.22	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.15	ND	0.049	
76-13-1	Trichlorotrifluoroethane	0.51	0.15	0.067	0.020	
75-15-0	Carbon Disulfide	ND	7.7	ND	2.5	
156-60-5	trans-1,2-Dichloroethene	ND	0.15	ND	0.039	
75-34-3	1,1-Dichloroethane	ND	0.15	ND	0.038	
1634-04-4	Methyl tert-Butyl Ether	ND	0.15	ND	0.043	
108-05-4	Vinyl Acetate	ND	7.7	ND	2.2	
78-93-3	2-Butanone (MEK)	12	7.7	4.2	2.6	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P6-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
CAS Sample ID: P1204450-006

Test Code: EPA TO-15 Date Collected: 10/24/12
Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC00781

Initial Pressure (psig): -2.86 Final Pressure (psig): 3.50

Canister Dilution Factor: 1.54

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.15	ND	0.039	
141-78-6	Ethyl Acetate	8.6	1.5	2.4	0.43	
110-54-3	n-Hexane	2.0	0.77	0.58	0.22	
67-66-3	Chloroform	0.26	0.15	0.054	0.032	
109-99-9	Tetrahydrofuran (THF)	ND	0.77	ND	0.26	
107-06-2	1,2-Dichloroethane	0.27	0.15	0.067	0.038	
71-55-6	1,1,1-Trichloroethane	ND	0.15	ND	0.028	
71-43-2	Benzene	2.6	0.15	0.81	0.048	
56-23-5	Carbon Tetrachloride	0.40	0.15	0.064	0.024	
110-82-7	Cyclohexane	ND	1.5	ND	0.45	
78-87-5	1,2-Dichloropropane	ND	0.15	ND	0.033	
75-27-4	Bromodichloromethane	ND	0.15	ND	0.023	
79-01-6	Trichloroethene	ND	0.15	ND	0.029	
123-91-1	1,4-Dioxane	ND	0.77	ND	0.21	
80-62-6	Methyl Methacrylate	ND	1.5	ND	0.38	
142-82-5	n-Heptane	4.1	0.77	1.0	0.19	
10061-01-5	cis-1,3-Dichloropropene	ND	0.77	ND	0.17	
108-10-1	4-Methyl-2-pentanone	2.4	0.77	0.59	0.19	
10061-02-6	trans-1,3-Dichloropropene	ND	0.77	ND	0.17	
79-00-5	1,1,2-Trichloroethane	ND	0.15	ND	0.028	
108-88-3	Toluene	11	0.77	2.8	0.20	
591-78-6	2-Hexanone	1.2	0.77	0.28	0.19	
124-48-1	Dibromochloromethane	ND	0.15	ND	0.018	
106-93-4	1,2-Dibromoethane	ND	0.15	ND	0.020	
123-86-4	n-Butyl Acetate	ND	0.77	ND	0.16	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P6-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
CAS Sample ID: P1204450-006

Test Code: EPA TO-15 Date Collected: 10/24/12
Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC00781

Initial Pressure (psig): -2.86 Final Pressure (psig): 3.50

Canister Dilution Factor: 1.54

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	1.2	0.77	0.26	0.16	
127-18-4	Tetrachloroethene	0.44	0.15	0.064	0.023	
108-90-7	Chlorobenzene	ND	0.15	ND	0.033	
100-41-4	Ethylbenzene	0.96	0.77	0.22	0.18	
179601-23-1	m,p-Xylenes	3.1	0.77	0.71	0.18	
75-25-2	Bromoform	ND	0.77	ND	0.075	
100-42-5	Styrene	0.83	0.77	0.19	0.18	
95-47-6	o-Xylene	ND	0.77	ND	0.18	
111-84-2	n-Nonane	ND	0.77	ND	0.15	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.15	ND	0.022	
98-82-8	Cumene	ND	0.77	ND	0.16	
80-56-8	alpha-Pinene	1.5	0.77	0.27	0.14	
103-65-1	n-Propylbenzene	ND	0.77	ND	0.16	
622-96-8	4-Ethyltoluene	ND	0.77	ND	0.16	
108-67-8	1,3,5-Trimethylbenzene	ND	0.77	ND	0.16	
95-63-6	1,2,4-Trimethylbenzene	ND	0.77	ND	0.16	
100-44-7	Benzyl Chloride	ND	0.77	ND	0.15	
541-73-1	1,3-Dichlorobenzene	ND	0.15	ND	0.026	
106-46-7	1,4-Dichlorobenzene	0.30	0.15	0.049	0.026	
95-50-1	1,2-Dichlorobenzene	ND	0.15	ND	0.026	
5989-27-5	d-Limonene	1.4	0.77	0.26	0.14	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.77	ND	0.080	
120-82-1	1,2,4-Trichlorobenzene	ND	0.77	ND	0.10	
91-20-3	Naphthalene	ND	0.77	ND	0.15	
87-68-3	Hexachlorobutadiene	ND	0.77	ND	0.072	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P7-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
CAS Sample ID: P1204450-007

Test Code: EPA TO-15 Date Collected: 10/24/12
Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC01328

Initial Pressure (psig): -2.47 Final Pressure (psig): 3.50

Canister Dilution Factor: 1.49

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	5.0	0.75	2.9	0.43	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.6	0.75	0.52	0.15	
74-87-3	Chloromethane	0.68	0.30	0.33	0.14	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.75	ND	0.11	
75-01-4	Vinyl Chloride	ND	0.15	ND	0.058	
106-99-0	1,3-Butadiene	0.45	0.30	0.21	0.13	
74-83-9	Bromomethane	ND	0.15	ND	0.038	
75-00-3	Chloroethane	ND	0.15	ND	0.056	
64-17-5	Ethanol	30	7.5	16	4.0	
75-05-8	Acetonitrile	0.95	0.75	0.57	0.44	
107-02-8	Acrolein	8.8	3.0	3.8	1.3	
67-64-1	Acetone	190	7.5	82	3.1	
75-69-4	Trichlorofluoromethane	1.6	0.15	0.28	0.027	
67-63-0	2-Propanol (Isopropyl Alcohol)	12	7.5	4.7	3.0	
107-13-1	Acrylonitrile	ND	0.75	ND	0.34	
75-35-4	1,1-Dichloroethene	ND	0.15	ND	0.038	
75-09-2	Methylene Chloride	2.5	0.75	0.72	0.21	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.15	ND	0.048	
76-13-1	Trichlorotrifluoroethane	0.63	0.15	0.082	0.019	
75-15-0	Carbon Disulfide	ND	7.5	ND	2.4	
156-60-5	trans-1,2-Dichloroethene	ND	0.15	ND	0.038	
75-34-3	1,1-Dichloroethane	ND	0.15	ND	0.037	
1634-04-4	Methyl tert-Butyl Ether	0.21	0.15	0.057	0.041	
108-05-4	Vinyl Acetate	ND	7.5	ND	2.1	
78-93-3	2-Butanone (MEK)	13	7.5	4.5	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P7-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
CAS Sample ID: P1204450-007

Test Code: EPA TO-15 Date Collected: 10/24/12
Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC01328

Initial Pressure (psig): -2.47 Final Pressure (psig): 3.50

Canister Dilution Factor: 1.49

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.15	ND	0.038	
141-78-6	Ethyl Acetate	5.9	1.5	1.6	0.41	
110-54-3	n-Hexane	1.9	0.75	0.55	0.21	
67-66-3	Chloroform	0.35	0.15	0.073	0.031	
109-99-9	Tetrahydrofuran (THF)	1.3	0.75	0.44	0.25	
107-06-2	1,2-Dichloroethane	0.40	0.15	0.099	0.037	
71-55-6	1,1,1-Trichloroethane	ND	0.15	ND	0.027	
71-43-2	Benzene	2.5	0.15	0.77	0.047	
56-23-5	Carbon Tetrachloride	0.54	0.15	0.085	0.024	
110-82-7	Cyclohexane	ND	1.5	ND	0.43	
78-87-5	1,2-Dichloropropane	ND	0.15	ND	0.032	
75-27-4	Bromodichloromethane	ND	0.15	ND	0.022	
79-01-6	Trichloroethene	ND	0.15	ND	0.028	
123-91-1	1,4-Dioxane	ND	0.75	ND	0.21	
80-62-6	Methyl Methacrylate	ND	1.5	ND	0.36	
142-82-5	n-Heptane	1.4	0.75	0.35	0.18	
10061-01-5	cis-1,3-Dichloropropene	ND	0.75	ND	0.16	
108-10-1	4-Methyl-2-pentanone	ND	0.75	ND	0.18	
10061-02-6	trans-1,3-Dichloropropene	ND	0.75	ND	0.16	
79-00-5	1,1,2-Trichloroethane	ND	0.15	ND	0.027	
108-88-3	Toluene	5.6	0.75	1.5	0.20	
591-78-6	2-Hexanone	1.9	0.75	0.45	0.18	
124-48-1	Dibromochloromethane	ND	0.15	ND	0.017	
106-93-4	1,2-Dibromoethane	ND	0.15	ND	0.019	
123-86-4	n-Butyl Acetate	0.85	0.75	0.18	0.16	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P7-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
CAS Sample ID: P1204450-007

Test Code: EPA TO-15 Date Collected: 10/24/12
Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC01328

Initial Pressure (psig): -2.47 Final Pressure (psig): 3.50

Canister Dilution Factor: 1.49

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	1.0	0.75	0.22	0.16	
127-18-4	Tetrachloroethene	0.36	0.15	0.054	0.022	
108-90-7	Chlorobenzene	ND	0.15	ND	0.032	
100-41-4	Ethylbenzene	0.97	0.75	0.22	0.17	
179601-23-1	m,p-Xylenes	3.2	0.75	0.73	0.17	
75-25-2	Bromoform	ND	0.75	ND	0.072	
100-42-5	Styrene	ND	0.75	ND	0.18	
95-47-6	o-Xylene	ND	0.75	ND	0.17	
111-84-2	n-Nonane	ND	0.75	ND	0.14	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.15	ND	0.022	
98-82-8	Cumene	ND	0.75	ND	0.15	
80-56-8	alpha-Pinene	1.9	0.75	0.33	0.13	
103-65-1	n-Propylbenzene	ND	0.75	ND	0.15	
622-96-8	4-Ethyltoluene	ND	0.75	ND	0.15	
108-67-8	1,3,5-Trimethylbenzene	ND	0.75	ND	0.15	
95-63-6	1,2,4-Trimethylbenzene	ND	0.75	ND	0.15	
100-44-7	Benzyl Chloride	ND	0.75	ND	0.14	
541-73-1	1,3-Dichlorobenzene	ND	0.15	ND	0.025	
106-46-7	1,4-Dichlorobenzene	0.36	0.15	0.060	0.025	
95-50-1	1,2-Dichlorobenzene	ND	0.15	ND	0.025	
5989-27-5	d-Limonene	1.6	0.75	0.29	0.13	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.75	ND	0.077	
120-82-1	1,2,4-Trichlorobenzene	ND	0.75	ND	0.10	
91-20-3	Naphthalene	ND	0.75	ND	0.14	
87-68-3	Hexachlorobutadiene	ND	0.75	ND	0.070	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P8-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
CAS Sample ID: P1204450-008

Test Code: EPA TO-15 Date Collected: 10/24/12
Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC00720

Initial Pressure (psig): -2.96 Final Pressure (psig): 3.51

Canister Dilution Factor: 1.55

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	3.6	0.78	2.1	0.45	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.7	0.78	0.55	0.16	
74-87-3	Chloromethane	0.66	0.31	0.32	0.15	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.78	ND	0.11	
75-01-4	Vinyl Chloride	ND	0.16	ND	0.061	
106-99-0	1,3-Butadiene	0.35	0.31	0.16	0.14	
74-83-9	Bromomethane	ND	0.16	ND	0.040	
75-00-3	Chloroethane	ND	0.16	ND	0.059	
64-17-5	Ethanol	31	7.8	16	4.1	
75-05-8	Acetonitrile	ND	0.78	ND	0.46	
107-02-8	Acrolein	4.5	3.1	1.9	1.4	
67-64-1	Acetone	100	7.8	43	3.3	
75-69-4	Trichlorofluoromethane	7.9	0.16	1.4	0.028	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	7.8	ND	3.2	
107-13-1	Acrylonitrile	ND	0.78	ND	0.36	
75-35-4	1,1-Dichloroethene	ND	0.16	ND	0.039	
75-09-2	Methylene Chloride	2.3	0.78	0.68	0.22	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.16	ND	0.050	
76-13-1	Trichlorotrifluoroethane	0.67	0.16	0.088	0.020	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
156-60-5	trans-1,2-Dichloroethene	ND	0.16	ND	0.039	
75-34-3	1,1-Dichloroethane	ND	0.16	ND	0.038	
1634-04-4	Methyl tert-Butyl Ether	ND	0.16	ND	0.043	
108-05-4	Vinyl Acetate	ND	7.8	ND	2.2	
78-93-3	2-Butanone (MEK)	8.1	7.8	2.7	2.6	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P8-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
CAS Sample ID: P1204450-008

Test Code: EPA TO-15 Date Collected: 10/24/12
Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC00720

Initial Pressure (psig): -2.96 Final Pressure (psig): 3.51

Canister Dilution Factor: 1.55

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.16	ND	0.039	
141-78-6	Ethyl Acetate	8.7	1.6	2.4	0.43	
110-54-3	n-Hexane	1.9	0.78	0.54	0.22	
67-66-3	Chloroform	0.28	0.16	0.058	0.032	
109-99-9	Tetrahydrofuran (THF)	ND	0.78	ND	0.26	
107-06-2	1,2-Dichloroethane	0.19	0.16	0.046	0.038	
71-55-6	1,1,1-Trichloroethane	ND	0.16	ND	0.028	
71-43-2	Benzene	1.9	0.16	0.60	0.049	
56-23-5	Carbon Tetrachloride	0.55	0.16	0.087	0.025	
110-82-7	Cyclohexane	ND	1.6	ND	0.45	
78-87-5	1,2-Dichloropropane	ND	0.16	ND	0.034	
75-27-4	Bromodichloromethane	ND	0.16	ND	0.023	
79-01-6	Trichloroethene	ND	0.16	ND	0.029	
123-91-1	1,4-Dioxane	ND	0.78	ND	0.22	
80-62-6	Methyl Methacrylate	ND	1.6	ND	0.38	
142-82-5	n-Heptane	1.3	0.78	0.32	0.19	
10061-01-5	cis-1,3-Dichloropropene	ND	0.78	ND	0.17	
108-10-1	4-Methyl-2-pentanone	ND	0.78	ND	0.19	
10061-02-6	trans-1,3-Dichloropropene	ND	0.78	ND	0.17	
79-00-5	1,1,2-Trichloroethane	ND	0.16	ND	0.028	
108-88-3	Toluene	6.0	0.78	1.6	0.21	
591-78-6	2-Hexanone	0.96	0.78	0.24	0.19	
124-48-1	Dibromochloromethane	ND	0.16	ND	0.018	
106-93-4	1,2-Dibromoethane	ND	0.16	ND	0.020	
123-86-4	n-Butyl Acetate	1.1	0.78	0.24	0.16	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P8-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
CAS Sample ID: P1204450-008

Test Code: EPA TO-15 Date Collected: 10/24/12
Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC00720

Initial Pressure (psig): -2.96 Final Pressure (psig): 3.51

Canister Dilution Factor: 1.55

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	0.89	0.78	0.19	0.17	
127-18-4	Tetrachloroethene	0.53	0.16	0.079	0.023	
108-90-7	Chlorobenzene	ND	0.16	ND	0.034	
100-41-4	Ethylbenzene	0.97	0.78	0.22	0.18	
179601-23-1	m,p-Xylenes	3.3	0.78	0.75	0.18	
75-25-2	Bromoform	ND	0.78	ND	0.075	
100-42-5	Styrene	ND	0.78	ND	0.18	
95-47-6	o-Xylene	0.89	0.78	0.21	0.18	
111-84-2	n-Nonane	ND	0.78	ND	0.15	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.16	ND	0.023	
98-82-8	Cumene	ND	0.78	ND	0.16	
80-56-8	alpha-Pinene	1.5	0.78	0.28	0.14	
103-65-1	n-Propylbenzene	ND	0.78	ND	0.16	
622-96-8	4-Ethyltoluene	ND	0.78	ND	0.16	
108-67-8	1,3,5-Trimethylbenzene	ND	0.78	ND	0.16	
95-63-6	1,2,4-Trimethylbenzene	ND	0.78	ND	0.16	
100-44-7	Benzyl Chloride	ND	0.78	ND	0.15	
541-73-1	1,3-Dichlorobenzene	ND	0.16	ND	0.026	
106-46-7	1,4-Dichlorobenzene	0.38	0.16	0.063	0.026	
95-50-1	1,2-Dichlorobenzene	ND	0.16	ND	0.026	
5989-27-5	d-Limonene	1.3	0.78	0.23	0.14	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.78	ND	0.080	
120-82-1	1,2,4-Trichlorobenzene	ND	0.78	ND	0.10	
91-20-3	Naphthalene	ND	0.78	ND	0.15	
87-68-3	Hexachlorobutadiene	ND	0.78	ND	0.073	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-C1-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
CAS Sample ID: P1204450-009

Test Code: EPA TO-15 Date Collected: 10/24/12
Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC00596

Initial Pressure (psig): -2.72 Final Pressure (psig): 3.50

Canister Dilution Factor: 1.52

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	3.9	0.76	2.3	0.44	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.6	0.76	0.52	0.15	
74-87-3	Chloromethane	0.66	0.30	0.32	0.15	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.76	ND	0.11	
75-01-4	Vinyl Chloride	ND	0.15	ND	0.059	
106-99-0	1,3-Butadiene	0.54	0.30	0.25	0.14	
74-83-9	Bromomethane	ND	0.15	ND	0.039	
75-00-3	Chloroethane	ND	0.15	ND	0.058	
64-17-5	Ethanol	30	7.6	16	4.0	
75-05-8	Acetonitrile	1.2	0.76	0.74	0.45	
107-02-8	Acrolein	5.7	3.0	2.5	1.3	
67-64-1	Acetone	140	7.6	57	3.2	
75-69-4	Trichlorofluoromethane	1.6	0.15	0.29	0.027	
67-63-0	2-Propanol (Isopropyl Alcohol)	9.0	7.6	3.7	3.1	
107-13-1	Acrylonitrile	ND	0.76	ND	0.35	
75-35-4	1,1-Dichloroethene	ND	0.15	ND	0.038	
75-09-2	Methylene Chloride	2.9	0.76	0.85	0.22	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.15	ND	0.049	
76-13-1	Trichlorotrifluoroethane	0.64	0.15	0.083	0.020	
75-15-0	Carbon Disulfide	ND	7.6	ND	2.4	
156-60-5	trans-1,2-Dichloroethene	ND	0.15	ND	0.038	
75-34-3	1,1-Dichloroethane	ND	0.15	ND	0.038	
1634-04-4	Methyl tert-Butyl Ether	0.21	0.15	0.057	0.042	
108-05-4	Vinyl Acetate	ND	7.6	ND	2.2	
78-93-3	2-Butanone (MEK)	11	7.6	3.6	2.6	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-C1-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
CAS Sample ID: P1204450-009

Test Code: EPA TO-15 Date Collected: 10/24/12
Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC00596

Initial Pressure (psig): -2.72 Final Pressure (psig): 3.50

Canister Dilution Factor: 1.52

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.15	ND	0.038	
141-78-6	Ethyl Acetate	9.9	1.5	2.8	0.42	
110-54-3	n-Hexane	2.0	0.76	0.57	0.22	
67-66-3	Chloroform	0.24	0.15	0.050	0.031	
109-99-9	Tetrahydrofuran (THF)	ND	0.76	ND	0.26	
107-06-2	1,2-Dichloroethane	0.23	0.15	0.057	0.038	
71-55-6	1,1,1-Trichloroethane	ND	0.15	ND	0.028	
71-43-2	Benzene	3.2	0.15	1.0	0.048	
56-23-5	Carbon Tetrachloride	0.43	0.15	0.068	0.024	
110-82-7	Cyclohexane	ND	1.5	ND	0.44	
78-87-5	1,2-Dichloropropane	ND	0.15	ND	0.033	
75-27-4	Bromodichloromethane	ND	0.15	ND	0.023	
79-01-6	Trichloroethene	ND	0.15	ND	0.028	
123-91-1	1,4-Dioxane	ND	0.76	ND	0.21	
80-62-6	Methyl Methacrylate	ND	1.5	ND	0.37	
142-82-5	n-Heptane	1.4	0.76	0.35	0.19	
10061-01-5	cis-1,3-Dichloropropene	ND	0.76	ND	0.17	
108-10-1	4-Methyl-2-pentanone	ND	0.76	ND	0.19	
10061-02-6	trans-1,3-Dichloropropene	ND	0.76	ND	0.17	
79-00-5	1,1,2-Trichloroethane	ND	0.15	ND	0.028	
108-88-3	Toluene	7.3	0.76	2.0	0.20	
591-78-6	2-Hexanone	1.2	0.76	0.30	0.19	
124-48-1	Dibromochloromethane	ND	0.15	ND	0.018	
106-93-4	1,2-Dibromoethane	ND	0.15	ND	0.020	
123-86-4	n-Butyl Acetate	1.4	0.76	0.30	0.16	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-C1-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
 CAS Sample ID: P1204450-009

Test Code: EPA TO-15 Date Collected: 10/24/12
 Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
 Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
 Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
 Test Notes:
 Container ID: AC00596

Initial Pressure (psig): -2.72 Final Pressure (psig): 3.50

Canister Dilution Factor: 1.52

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	1.0	0.76	0.21	0.16	
127-18-4	Tetrachloroethene	0.50	0.15	0.073	0.022	
108-90-7	Chlorobenzene	ND	0.15	ND	0.033	
100-41-4	Ethylbenzene	0.98	0.76	0.23	0.18	
179601-23-1	m,p-Xylenes	3.3	0.76	0.75	0.18	
75-25-2	Bromoform	ND	0.76	ND	0.074	
100-42-5	Styrene	ND	0.76	ND	0.18	
95-47-6	o-Xylene	0.82	0.76	0.19	0.18	
111-84-2	n-Nonane	ND	0.76	ND	0.14	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.15	ND	0.022	
98-82-8	Cumene	ND	0.76	ND	0.15	
80-56-8	alpha-Pinene	1.6	0.76	0.29	0.14	
103-65-1	n-Propylbenzene	ND	0.76	ND	0.15	
622-96-8	4-Ethyltoluene	ND	0.76	ND	0.15	
108-67-8	1,3,5-Trimethylbenzene	ND	0.76	ND	0.15	
95-63-6	1,2,4-Trimethylbenzene	ND	0.76	ND	0.15	
100-44-7	Benzyl Chloride	ND	0.76	ND	0.15	
541-73-1	1,3-Dichlorobenzene	ND	0.15	ND	0.025	
106-46-7	1,4-Dichlorobenzene	0.37	0.15	0.062	0.025	
95-50-1	1,2-Dichlorobenzene	ND	0.15	ND	0.025	
5989-27-5	d-Limonene	1.9	0.76	0.34	0.14	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.76	ND	0.079	
120-82-1	1,2,4-Trichlorobenzene	ND	0.76	ND	0.10	
91-20-3	Naphthalene	ND	0.76	ND	0.15	
87-68-3	Hexachlorobutadiene	ND	0.76	ND	0.071	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-C2-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
CAS Sample ID: P1204450-010

Test Code: EPA TO-15 Date Collected: 10/24/12
Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC01865

Initial Pressure (psig): -2.89 Final Pressure (psig): 3.58

Canister Dilution Factor: 1.55

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	2.3	0.78	1.3	0.45	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.6	0.78	0.53	0.16	
74-87-3	Chloromethane	0.61	0.31	0.29	0.15	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.78	ND	0.11	
75-01-4	Vinyl Chloride	ND	0.16	ND	0.061	
106-99-0	1,3-Butadiene	0.33	0.31	0.15	0.14	
74-83-9	Bromomethane	ND	0.16	ND	0.040	
75-00-3	Chloroethane	ND	0.16	ND	0.059	
64-17-5	Ethanol	23	7.8	12	4.1	
75-05-8	Acetonitrile	1.1	0.78	0.67	0.46	
107-02-8	Acrolein	ND	3.1	ND	1.4	
67-64-1	Acetone	54	7.8	23	3.3	
75-69-4	Trichlorofluoromethane	1.7	0.16	0.30	0.028	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	7.8	ND	3.2	
107-13-1	Acrylonitrile	ND	0.78	ND	0.36	
75-35-4	1,1-Dichloroethene	ND	0.16	ND	0.039	
75-09-2	Methylene Chloride	2.9	0.78	0.84	0.22	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.16	ND	0.050	
76-13-1	Trichlorotrifluoroethane	0.65	0.16	0.085	0.020	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
156-60-5	trans-1,2-Dichloroethene	ND	0.16	ND	0.039	
75-34-3	1,1-Dichloroethane	ND	0.16	ND	0.038	
1634-04-4	Methyl tert-Butyl Ether	ND	0.16	ND	0.043	
108-05-4	Vinyl Acetate	ND	7.8	ND	2.2	
78-93-3	2-Butanone (MEK)	ND	7.8	ND	2.6	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-C2-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
 CAS Sample ID: P1204450-010

Test Code: EPA TO-15 Date Collected: 10/24/12
 Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
 Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
 Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
 Test Notes:
 Container ID: AC01865

Initial Pressure (psig): -2.89 Final Pressure (psig): 3.58

Canister Dilution Factor: 1.55

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.16	ND	0.039	
141-78-6	Ethyl Acetate	9.4	1.6	2.6	0.43	
110-54-3	n-Hexane	1.9	0.78	0.55	0.22	
67-66-3	Chloroform	0.25	0.16	0.051	0.032	
109-99-9	Tetrahydrofuran (THF)	ND	0.78	ND	0.26	
107-06-2	1,2-Dichloroethane	ND	0.16	ND	0.038	
71-55-6	1,1,1-Trichloroethane	ND	0.16	ND	0.028	
71-43-2	Benzene	2.1	0.16	0.66	0.049	
56-23-5	Carbon Tetrachloride	0.54	0.16	0.086	0.025	
110-82-7	Cyclohexane	ND	1.6	ND	0.45	
78-87-5	1,2-Dichloropropane	ND	0.16	ND	0.034	
75-27-4	Bromodichloromethane	ND	0.16	ND	0.023	
79-01-6	Trichloroethene	ND	0.16	ND	0.029	
123-91-1	1,4-Dioxane	ND	0.78	ND	0.22	
80-62-6	Methyl Methacrylate	ND	1.6	ND	0.38	
142-82-5	n-Heptane	1.2	0.78	0.29	0.19	
10061-01-5	cis-1,3-Dichloropropene	ND	0.78	ND	0.17	
108-10-1	4-Methyl-2-pentanone	ND	0.78	ND	0.19	
10061-02-6	trans-1,3-Dichloropropene	ND	0.78	ND	0.17	
79-00-5	1,1,2-Trichloroethane	ND	0.16	ND	0.028	
108-88-3	Toluene	6.9	0.78	1.8	0.21	
591-78-6	2-Hexanone	ND	0.78	ND	0.19	
124-48-1	Dibromochloromethane	ND	0.16	ND	0.018	
106-93-4	1,2-Dibromoethane	ND	0.16	ND	0.020	
123-86-4	n-Butyl Acetate	ND	0.78	ND	0.16	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-C2-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
CAS Sample ID: P1204450-010

Test Code: EPA TO-15 Date Collected: 10/24/12
Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC01865

Initial Pressure (psig): -2.89 Final Pressure (psig): 3.58

Canister Dilution Factor: 1.55

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.78	ND	0.17	
127-18-4	Tetrachloroethene	0.68	0.16	0.10	0.023	
108-90-7	Chlorobenzene	ND	0.16	ND	0.034	
100-41-4	Ethylbenzene	0.84	0.78	0.19	0.18	
179601-23-1	m,p-Xylenes	2.6	0.78	0.59	0.18	
75-25-2	Bromoform	ND	0.78	ND	0.075	
100-42-5	Styrene	ND	0.78	ND	0.18	
95-47-6	o-Xylene	0.83	0.78	0.19	0.18	
111-84-2	n-Nonane	ND	0.78	ND	0.15	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.16	ND	0.023	
98-82-8	Cumene	ND	0.78	ND	0.16	
80-56-8	alpha-Pinene	0.96	0.78	0.17	0.14	
103-65-1	n-Propylbenzene	ND	0.78	ND	0.16	
622-96-8	4-Ethyltoluene	ND	0.78	ND	0.16	
108-67-8	1,3,5-Trimethylbenzene	ND	0.78	ND	0.16	
95-63-6	1,2,4-Trimethylbenzene	ND	0.78	ND	0.16	
100-44-7	Benzyl Chloride	ND	0.78	ND	0.15	
541-73-1	1,3-Dichlorobenzene	ND	0.16	ND	0.026	
106-46-7	1,4-Dichlorobenzene	0.32	0.16	0.053	0.026	
95-50-1	1,2-Dichlorobenzene	ND	0.16	ND	0.026	
5989-27-5	d-Limonene	ND	0.78	ND	0.14	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.78	ND	0.080	
120-82-1	1,2,4-Trichlorobenzene	ND	0.78	ND	0.10	
91-20-3	Naphthalene	ND	0.78	ND	0.15	
87-68-3	Hexachlorobutadiene	ND	0.78	ND	0.073	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-C3-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
CAS Sample ID: P1204450-011

Test Code: EPA TO-15 Date Collected: 10/24/12
Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC01559

Initial Pressure (psig): -3.24 Final Pressure (psig): 3.55

Canister Dilution Factor: 1.59

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	3.2	0.80	1.9	0.46	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.6	0.80	0.53	0.16	
74-87-3	Chloromethane	0.64	0.32	0.31	0.15	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.80	ND	0.11	
75-01-4	Vinyl Chloride	ND	0.16	ND	0.062	
106-99-0	1,3-Butadiene	0.49	0.32	0.22	0.14	
74-83-9	Bromomethane	ND	0.16	ND	0.041	
75-00-3	Chloroethane	ND	0.16	ND	0.060	
64-17-5	Ethanol	24	8.0	13	4.2	
75-05-8	Acetonitrile	1.0	0.80	0.60	0.47	
107-02-8	Acrolein	4.1	3.2	1.8	1.4	
67-64-1	Acetone	90	8.0	38	3.3	
75-69-4	Trichlorofluoromethane	1.5	0.16	0.27	0.028	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	8.0	ND	3.2	
107-13-1	Acrylonitrile	ND	0.80	ND	0.37	
75-35-4	1,1-Dichloroethene	ND	0.16	ND	0.040	
75-09-2	Methylene Chloride	2.7	0.80	0.78	0.23	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.16	ND	0.051	
76-13-1	Trichlorotrifluoroethane	0.66	0.16	0.086	0.021	
75-15-0	Carbon Disulfide	ND	8.0	ND	2.6	
156-60-5	trans-1,2-Dichloroethene	ND	0.16	ND	0.040	
75-34-3	1,1-Dichloroethane	ND	0.16	ND	0.039	
1634-04-4	Methyl tert-Butyl Ether	ND	0.16	ND	0.044	
108-05-4	Vinyl Acetate	ND	8.0	ND	2.3	
78-93-3	2-Butanone (MEK)	ND	8.0	ND	2.7	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-C3-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
 CAS Sample ID: P1204450-011

Test Code: EPA TO-15 Date Collected: 10/24/12
 Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
 Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
 Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
 Test Notes:
 Container ID: AC01559

Initial Pressure (psig): -3.24 Final Pressure (psig): 3.55

Canister Dilution Factor: 1.59

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.16	ND	0.040	
141-78-6	Ethyl Acetate	9.6	1.6	2.7	0.44	
110-54-3	n-Hexane	2.0	0.80	0.56	0.23	
67-66-3	Chloroform	0.25	0.16	0.050	0.033	
109-99-9	Tetrahydrofuran (THF)	ND	0.80	ND	0.27	
107-06-2	1,2-Dichloroethane	0.17	0.16	0.043	0.039	
71-55-6	1,1,1-Trichloroethane	ND	0.16	ND	0.029	
71-43-2	Benzene	7.7	0.16	2.4	0.050	
56-23-5	Carbon Tetrachloride	0.54	0.16	0.086	0.025	
110-82-7	Cyclohexane	ND	1.6	ND	0.46	
78-87-5	1,2-Dichloropropane	ND	0.16	ND	0.034	
75-27-4	Bromodichloromethane	ND	0.16	ND	0.024	
79-01-6	Trichloroethene	ND	0.16	ND	0.030	
123-91-1	1,4-Dioxane	ND	0.80	ND	0.22	
80-62-6	Methyl Methacrylate	ND	1.6	ND	0.39	
142-82-5	n-Heptane	1.3	0.80	0.31	0.19	
10061-01-5	cis-1,3-Dichloropropene	ND	0.80	ND	0.18	
108-10-1	4-Methyl-2-pentanone	ND	0.80	ND	0.19	
10061-02-6	trans-1,3-Dichloropropene	ND	0.80	ND	0.18	
79-00-5	1,1,2-Trichloroethane	ND	0.16	ND	0.029	
108-88-3	Toluene	6.7	0.80	1.8	0.21	
591-78-6	2-Hexanone	0.85	0.80	0.21	0.19	
124-48-1	Dibromochloromethane	ND	0.16	ND	0.019	
106-93-4	1,2-Dibromoethane	ND	0.16	ND	0.021	
123-86-4	n-Butyl Acetate	1.2	0.80	0.24	0.17	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-C3-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
 CAS Sample ID: P1204450-011

Test Code: EPA TO-15 Date Collected: 10/24/12
 Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
 Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
 Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
 Test Notes:
 Container ID: AC01559

Initial Pressure (psig): -3.24 Final Pressure (psig): 3.55

Canister Dilution Factor: 1.59

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	0.85	0.80	0.18	0.17	
127-18-4	Tetrachloroethene	0.58	0.16	0.086	0.023	
108-90-7	Chlorobenzene	ND	0.16	ND	0.035	
100-41-4	Ethylbenzene	0.94	0.80	0.22	0.18	
179601-23-1	m,p-Xylenes	3.2	0.80	0.73	0.18	
75-25-2	Bromoform	ND	0.80	ND	0.077	
100-42-5	Styrene	ND	0.80	ND	0.19	
95-47-6	o-Xylene	0.91	0.80	0.21	0.18	
111-84-2	n-Nonane	ND	0.80	ND	0.15	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.16	ND	0.023	
98-82-8	Cumene	ND	0.80	ND	0.16	
80-56-8	alpha-Pinene	0.90	0.80	0.16	0.14	
103-65-1	n-Propylbenzene	ND	0.80	ND	0.16	
622-96-8	4-Ethyltoluene	ND	0.80	ND	0.16	
108-67-8	1,3,5-Trimethylbenzene	ND	0.80	ND	0.16	
95-63-6	1,2,4-Trimethylbenzene	ND	0.80	ND	0.16	
100-44-7	Benzyl Chloride	ND	0.80	ND	0.15	
541-73-1	1,3-Dichlorobenzene	ND	0.16	ND	0.026	
106-46-7	1,4-Dichlorobenzene	0.34	0.16	0.057	0.026	
95-50-1	1,2-Dichlorobenzene	ND	0.16	ND	0.026	
5989-27-5	d-Limonene	1.2	0.80	0.22	0.14	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.80	ND	0.082	
120-82-1	1,2,4-Trichlorobenzene	ND	0.80	ND	0.11	
91-20-3	Naphthalene	ND	0.80	ND	0.15	
87-68-3	Hexachlorobutadiene	ND	0.80	ND	0.075	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-C4-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
CAS Sample ID: P1204450-012

Test Code: EPA TO-15 Date Collected: 10/24/12
Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC01472

Initial Pressure (psig): -2.61 Final Pressure (psig): 3.52

Canister Dilution Factor: 1.51

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	4.3	0.76	2.5	0.44	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.7	0.76	0.54	0.15	
74-87-3	Chloromethane	0.67	0.30	0.33	0.15	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.76	ND	0.11	
75-01-4	Vinyl Chloride	ND	0.15	ND	0.059	
106-99-0	1,3-Butadiene	0.63	0.30	0.29	0.14	
74-83-9	Bromomethane	ND	0.15	ND	0.039	
75-00-3	Chloroethane	ND	0.15	ND	0.057	
64-17-5	Ethanol	31	7.6	17	4.0	
75-05-8	Acetonitrile	1.1	0.76	0.66	0.45	
107-02-8	Acrolein	6.2	3.0	2.7	1.3	
67-64-1	Acetone	130	7.6	54	3.2	
75-69-4	Trichlorofluoromethane	1.6	0.15	0.29	0.027	
67-63-0	2-Propanol (Isopropyl Alcohol)	8.3	7.6	3.4	3.1	
107-13-1	Acrylonitrile	ND	0.76	ND	0.35	
75-35-4	1,1-Dichloroethene	ND	0.15	ND	0.038	
75-09-2	Methylene Chloride	4.1	0.76	1.2	0.22	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.15	ND	0.048	
76-13-1	Trichlorotrifluoroethane	0.64	0.15	0.084	0.020	
75-15-0	Carbon Disulfide	ND	7.6	ND	2.4	
156-60-5	trans-1,2-Dichloroethene	ND	0.15	ND	0.038	
75-34-3	1,1-Dichloroethane	ND	0.15	ND	0.037	
1634-04-4	Methyl tert-Butyl Ether	ND	0.15	ND	0.042	
108-05-4	Vinyl Acetate	ND	7.6	ND	2.1	
78-93-3	2-Butanone (MEK)	12	7.6	4.0	2.6	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-C4-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
 CAS Sample ID: P1204450-012

Test Code: EPA TO-15 Date Collected: 10/24/12
 Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
 Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
 Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
 Test Notes:
 Container ID: AC01472

Initial Pressure (psig): -2.61 Final Pressure (psig): 3.52

Canister Dilution Factor: 1.51

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.15	ND	0.038	
141-78-6	Ethyl Acetate	12	1.5	3.2	0.42	
110-54-3	n-Hexane	4.7	0.76	1.3	0.21	
67-66-3	Chloroform	0.28	0.15	0.058	0.031	
109-99-9	Tetrahydrofuran (THF)	1.1	0.76	0.36	0.26	
107-06-2	1,2-Dichloroethane	2.1	0.15	0.52	0.037	
71-55-6	1,1,1-Trichloroethane	ND	0.15	ND	0.028	
71-43-2	Benzene	33	0.15	10	0.047	
56-23-5	Carbon Tetrachloride	0.54	0.15	0.086	0.024	
110-82-7	Cyclohexane	ND	1.5	ND	0.44	
78-87-5	1,2-Dichloropropane	0.73	0.15	0.16	0.033	
75-27-4	Bromodichloromethane	ND	0.15	ND	0.023	
79-01-6	Trichloroethene	ND	0.15	ND	0.028	
123-91-1	1,4-Dioxane	ND	0.76	ND	0.21	
80-62-6	Methyl Methacrylate	ND	1.5	ND	0.37	
142-82-5	n-Heptane	2.9	0.76	0.70	0.18	
10061-01-5	cis-1,3-Dichloropropene	ND	0.76	ND	0.17	
108-10-1	4-Methyl-2-pentanone	1.3	0.76	0.32	0.18	
10061-02-6	trans-1,3-Dichloropropene	ND	0.76	ND	0.17	
79-00-5	1,1,2-Trichloroethane	ND	0.15	ND	0.028	
108-88-3	Toluene	31	0.76	8.3	0.20	
591-78-6	2-Hexanone	ND	0.76	ND	0.18	
124-48-1	Dibromochloromethane	ND	0.15	ND	0.018	
106-93-4	1,2-Dibromoethane	ND	0.15	ND	0.020	
123-86-4	n-Butyl Acetate	1.4	0.76	0.30	0.16	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-C4-102412
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
CAS Sample ID: P1204450-012

Test Code: EPA TO-15 Date Collected: 10/24/12
Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC01472

Initial Pressure (psig): -2.61 Final Pressure (psig): 3.52

Canister Dilution Factor: 1.51

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	3.5	0.76	0.75	0.16	
127-18-4	Tetrachloroethene	0.89	0.15	0.13	0.022	
108-90-7	Chlorobenzene	0.56	0.15	0.12	0.033	
100-41-4	Ethylbenzene	5.5	0.76	1.3	0.17	
179601-23-1	m,p-Xylenes	6.5	0.76	1.5	0.17	
75-25-2	Bromoform	ND	0.76	ND	0.073	
100-42-5	Styrene	21	0.76	4.9	0.18	
95-47-6	o-Xylene	6.5	0.76	1.5	0.17	
111-84-2	n-Nonane	5.3	0.76	1.0	0.14	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.15	ND	0.022	
98-82-8	Cumene	4.9	0.76	0.99	0.15	
80-56-8	alpha-Pinene	3.1	0.76	0.56	0.14	
103-65-1	n-Propylbenzene	ND	0.76	ND	0.15	
622-96-8	4-Ethyltoluene	ND	0.76	ND	0.15	
108-67-8	1,3,5-Trimethylbenzene	0.78	0.76	0.16	0.15	
95-63-6	1,2,4-Trimethylbenzene	2.8	0.76	0.57	0.15	
100-44-7	Benzyl Chloride	ND	0.76	ND	0.15	
541-73-1	1,3-Dichlorobenzene	ND	0.15	ND	0.025	
106-46-7	1,4-Dichlorobenzene	0.42	0.15	0.070	0.025	
95-50-1	1,2-Dichlorobenzene	ND	0.15	ND	0.025	
5989-27-5	d-Limonene	6.2	0.76	1.1	0.14	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.76	ND	0.078	
120-82-1	1,2,4-Trichlorobenzene	ND	0.76	ND	0.10	
91-20-3	Naphthalene	3.0	0.76	0.57	0.14	
87-68-3	Hexachlorobutadiene	ND	0.76	ND	0.071	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-C3-102412-D
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
CAS Sample ID: P1204450-013

Test Code: EPA TO-15 Date Collected: 10/24/12
Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC01168

Initial Pressure (psig): -1.01 Final Pressure (psig): 3.56

Canister Dilution Factor: 1.33

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	4.0	0.67	2.3	0.39	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.6	0.67	0.52	0.13	
74-87-3	Chloromethane	0.67	0.27	0.33	0.13	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.67	ND	0.095	
75-01-4	Vinyl Chloride	ND	0.13	ND	0.052	
106-99-0	1,3-Butadiene	0.53	0.27	0.24	0.12	
74-83-9	Bromomethane	ND	0.13	ND	0.034	
75-00-3	Chloroethane	ND	0.13	ND	0.050	
64-17-5	Ethanol	29	6.7	16	3.5	
75-05-8	Acetonitrile	1.0	0.67	0.61	0.40	
107-02-8	Acrolein	4.9	2.7	2.2	1.2	
67-64-1	Acetone	110	6.7	48	2.8	
75-69-4	Trichlorofluoromethane	1.5	0.13	0.27	0.024	
67-63-0	2-Propanol (Isopropyl Alcohol)	8.3	6.7	3.4	2.7	
107-13-1	Acrylonitrile	ND	0.67	ND	0.31	
75-35-4	1,1-Dichloroethene	ND	0.13	ND	0.034	
75-09-2	Methylene Chloride	2.8	0.67	0.80	0.19	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.13	ND	0.043	
76-13-1	Trichlorotrifluoroethane	0.66	0.13	0.086	0.017	
75-15-0	Carbon Disulfide	ND	6.7	ND	2.1	
156-60-5	trans-1,2-Dichloroethene	ND	0.13	ND	0.034	
75-34-3	1,1-Dichloroethane	ND	0.13	ND	0.033	
1634-04-4	Methyl tert-Butyl Ether	0.18	0.13	0.051	0.037	
108-05-4	Vinyl Acetate	ND	6.7	ND	1.9	
78-93-3	2-Butanone (MEK)	9.0	6.7	3.0	2.3	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-C3-102412-D
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
 CAS Sample ID: P1204450-013

Test Code: EPA TO-15 Date Collected: 10/24/12
 Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
 Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
 Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
 Test Notes:
 Container ID: AC01168

Initial Pressure (psig): -1.01 Final Pressure (psig): 3.56

Canister Dilution Factor: 1.33

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.13	ND	0.034	
141-78-6	Ethyl Acetate	10	1.3	2.9	0.37	
110-54-3	n-Hexane	2.0	0.67	0.58	0.19	
67-66-3	Chloroform	0.25	0.13	0.051	0.027	
109-99-9	Tetrahydrofuran (THF)	0.67	0.67	0.23	0.23	
107-06-2	1,2-Dichloroethane	0.23	0.13	0.056	0.033	
71-55-6	1,1,1-Trichloroethane	ND	0.13	ND	0.024	
71-43-2	Benzene	7.6	0.13	2.4	0.042	
56-23-5	Carbon Tetrachloride	0.48	0.13	0.077	0.021	
110-82-7	Cyclohexane	ND	1.3	ND	0.39	
78-87-5	1,2-Dichloropropane	ND	0.13	ND	0.029	
75-27-4	Bromodichloromethane	ND	0.13	ND	0.020	
79-01-6	Trichloroethene	ND	0.13	ND	0.025	
123-91-1	1,4-Dioxane	ND	0.67	ND	0.18	
80-62-6	Methyl Methacrylate	ND	1.3	ND	0.32	
142-82-5	n-Heptane	1.4	0.67	0.35	0.16	
10061-01-5	cis-1,3-Dichloropropene	ND	0.67	ND	0.15	
108-10-1	4-Methyl-2-pentanone	ND	0.67	ND	0.16	
10061-02-6	trans-1,3-Dichloropropene	ND	0.67	ND	0.15	
79-00-5	1,1,2-Trichloroethane	ND	0.13	ND	0.024	
108-88-3	Toluene	6.8	0.67	1.8	0.18	
591-78-6	2-Hexanone	0.92	0.67	0.23	0.16	
124-48-1	Dibromochloromethane	ND	0.13	ND	0.016	
106-93-4	1,2-Dibromoethane	ND	0.13	ND	0.017	
123-86-4	n-Butyl Acetate	1.2	0.67	0.26	0.14	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-C3-102412-D
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
CAS Sample ID: P1204450-013

Test Code: EPA TO-15 Date Collected: 10/24/12
Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: 10/29/12
Analyst: Lusine Hakobyan Date Analyzed: 11/1/12
Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
Test Notes:
Container ID: AC01168

Initial Pressure (psig): -1.01 Final Pressure (psig): 3.56

Canister Dilution Factor: 1.33

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	0.89	0.67	0.19	0.14	
127-18-4	Tetrachloroethene	0.52	0.13	0.077	0.020	
108-90-7	Chlorobenzene	ND	0.13	ND	0.029	
100-41-4	Ethylbenzene	0.99	0.67	0.23	0.15	
179601-23-1	m,p-Xylenes	3.3	0.67	0.76	0.15	
75-25-2	Bromoform	ND	0.67	ND	0.064	
100-42-5	Styrene	0.69	0.67	0.16	0.16	
95-47-6	o-Xylene	0.85	0.67	0.19	0.15	
111-84-2	n-Nonane	ND	0.67	ND	0.13	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.13	ND	0.019	
98-82-8	Cumene	ND	0.67	ND	0.14	
80-56-8	alpha-Pinene	1.5	0.67	0.28	0.12	
103-65-1	n-Propylbenzene	ND	0.67	ND	0.14	
622-96-8	4-Ethyltoluene	ND	0.67	ND	0.14	
108-67-8	1,3,5-Trimethylbenzene	ND	0.67	ND	0.14	
95-63-6	1,2,4-Trimethylbenzene	ND	0.67	ND	0.14	
100-44-7	Benzyl Chloride	ND	0.67	ND	0.13	
541-73-1	1,3-Dichlorobenzene	ND	0.13	ND	0.022	
106-46-7	1,4-Dichlorobenzene	0.36	0.13	0.060	0.022	
95-50-1	1,2-Dichlorobenzene	ND	0.13	ND	0.022	
5989-27-5	d-Limonene	1.7	0.67	0.30	0.12	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.67	ND	0.069	
120-82-1	1,2,4-Trichlorobenzene	ND	0.67	ND	0.090	
91-20-3	Naphthalene	ND	0.67	ND	0.13	
87-68-3	Hexachlorobutadiene	ND	0.67	ND	0.062	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: Method Blank
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
 CAS Sample ID: P121101-MB

Test Code: EPA TO-15
 Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16
 Analyst: Lusine Hakobyan
 Sampling Media: 6.0 L Summa Canister
 Test Notes:

Date Collected: NA
 Date Received: NA
 Date Analyzed: 11/1/12
 Volume(s) Analyzed: 1.00 Liter(s)

Canister Dilution Factor: 1.00

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	ND	0.50	ND	0.29	
75-71-8	Dichlorodifluoromethane (CFC 12)	ND	0.50	ND	0.10	
74-87-3	Chloromethane	ND	0.20	ND	0.097	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.50	ND	0.072	
75-01-4	Vinyl Chloride	ND	0.10	ND	0.039	
106-99-0	1,3-Butadiene	ND	0.20	ND	0.090	
74-83-9	Bromomethane	ND	0.10	ND	0.026	
75-00-3	Chloroethane	ND	0.10	ND	0.038	
64-17-5	Ethanol	ND	5.0	ND	2.7	
75-05-8	Acetonitrile	ND	0.50	ND	0.30	
107-02-8	Acrolein	ND	2.0	ND	0.87	
67-64-1	Acetone	ND	5.0	ND	2.1	
75-69-4	Trichlorofluoromethane	ND	0.10	ND	0.018	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	5.0	ND	2.0	
107-13-1	Acrylonitrile	ND	0.50	ND	0.23	
75-35-4	1,1-Dichloroethene	ND	0.10	ND	0.025	
75-09-2	Methylene Chloride	ND	0.50	ND	0.14	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.10	ND	0.032	
76-13-1	Trichlorotrifluoroethane	ND	0.10	ND	0.013	
75-15-0	Carbon Disulfide	ND	5.0	ND	1.6	
156-60-5	trans-1,2-Dichloroethene	ND	0.10	ND	0.025	
75-34-3	1,1-Dichloroethane	ND	0.10	ND	0.025	
1634-04-4	Methyl tert-Butyl Ether	ND	0.10	ND	0.028	
108-05-4	Vinyl Acetate	ND	5.0	ND	1.4	
78-93-3	2-Butanone (MEK)	ND	5.0	ND	1.7	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: Method Blank
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
CAS Sample ID: P121101-MB

Test Code: EPA TO-15
Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16
Analyst: Lusine Hakobyan
Sampling Media: 6.0 L Summa Canister
Test Notes:

Date Collected: NA
Date Received: NA
Date Analyzed: 11/1/12
Volume(s) Analyzed: 1.00 Liter(s)

Canister Dilution Factor: 1.00

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.10	ND	0.025	
141-78-6	Ethyl Acetate	ND	1.0	ND	0.28	
110-54-3	n-Hexane	ND	0.50	ND	0.14	
67-66-3	Chloroform	ND	0.10	ND	0.020	
109-99-9	Tetrahydrofuran (THF)	ND	0.50	ND	0.17	
107-06-2	1,2-Dichloroethane	ND	0.10	ND	0.025	
71-55-6	1,1,1-Trichloroethane	ND	0.10	ND	0.018	
71-43-2	Benzene	ND	0.10	ND	0.031	
56-23-5	Carbon Tetrachloride	ND	0.10	ND	0.016	
110-82-7	Cyclohexane	ND	1.0	ND	0.29	
78-87-5	1,2-Dichloropropane	ND	0.10	ND	0.022	
75-27-4	Bromodichloromethane	ND	0.10	ND	0.015	
79-01-6	Trichloroethene	ND	0.10	ND	0.019	
123-91-1	1,4-Dioxane	ND	0.50	ND	0.14	
80-62-6	Methyl Methacrylate	ND	1.0	ND	0.24	
142-82-5	n-Heptane	ND	0.50	ND	0.12	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	ND	0.11	
108-10-1	4-Methyl-2-pentanone	ND	0.50	ND	0.12	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	ND	0.11	
79-00-5	1,1,2-Trichloroethane	ND	0.10	ND	0.018	
108-88-3	Toluene	ND	0.50	ND	0.13	
591-78-6	2-Hexanone	ND	0.50	ND	0.12	
124-48-1	Dibromochloromethane	ND	0.10	ND	0.012	
106-93-4	1,2-Dibromoethane	ND	0.10	ND	0.013	
123-86-4	n-Butyl Acetate	ND	0.50	ND	0.11	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 3 of 3

Client: CH2M Hill
Client Sample ID: Method Blank
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450
CAS Sample ID: P121101-MB

Test Code: EPA TO-15
Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16
Analyst: Lusine Hakobyan
Sampling Media: 6.0 L Summa Canister
Test Notes:

Date Collected: NA
Date Received: NA
Date Analyzed: 11/1/12
Volume(s) Analyzed: 1.00 Liter(s)

Canister Dilution Factor: 1.00

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.50	ND	0.11	
127-18-4	Tetrachloroethene	ND	0.10	ND	0.015	
108-90-7	Chlorobenzene	ND	0.10	ND	0.022	
100-41-4	Ethylbenzene	ND	0.50	ND	0.12	
179601-23-1	m,p-Xylenes	ND	0.50	ND	0.12	
75-25-2	Bromoform	ND	0.50	ND	0.048	
100-42-5	Styrene	ND	0.50	ND	0.12	
95-47-6	o-Xylene	ND	0.50	ND	0.12	
111-84-2	n-Nonane	ND	0.50	ND	0.095	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.10	ND	0.015	
98-82-8	Cumene	ND	0.50	ND	0.10	
80-56-8	alpha-Pinene	ND	0.50	ND	0.090	
103-65-1	n-Propylbenzene	ND	0.50	ND	0.10	
622-96-8	4-Ethyltoluene	ND	0.50	ND	0.10	
108-67-8	1,3,5-Trimethylbenzene	ND	0.50	ND	0.10	
95-63-6	1,2,4-Trimethylbenzene	ND	0.50	ND	0.10	
100-44-7	Benzyl Chloride	ND	0.50	ND	0.097	
541-73-1	1,3-Dichlorobenzene	ND	0.10	ND	0.017	
106-46-7	1,4-Dichlorobenzene	ND	0.10	ND	0.017	
95-50-1	1,2-Dichlorobenzene	ND	0.10	ND	0.017	
5989-27-5	d-Limonene	ND	0.50	ND	0.090	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.50	ND	0.052	
120-82-1	1,2,4-Trichlorobenzene	ND	0.50	ND	0.067	
91-20-3	Naphthalene	ND	0.50	ND	0.095	
87-68-3	Hexachlorobutadiene	ND	0.50	ND	0.047	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

SURROGATE SPIKE RECOVERY RESULTS

Page 1 of 1

Client: CH2M Hill

Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450

Test Code: EPA TO-15

Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16

Date(s) Collected: 10/24/12

Analyst: Lusine Hakobyan

Date(s) Received: 10/26 - 10/29/12

Sampling Media: 6.0 L Summa Canister(s)

Date(s) Analyzed: 11/1/12

Test Notes:

Client Sample ID	CAS Sample ID	1,2-Dichloroethane-d4	Toluene-d8	Bromofluorobenzene	Acceptance Limits	Data Qualifier
		Percent Recovered	Percent Recovered	Percent Recovered		
Method Blank	P121101-MB	101	100	96	70-130	
Lab Control Sample	P121101-LCS	98	100	98	70-130	
PZAA-P1-102412	P1204450-001	102	100	96	70-130	
PZAA-P2-102412	P1204450-002	103	100	94	70-130	
PZAA-P3-102412	P1204450-003	101	101	99	70-130	
PZAA-P4-102412	P1204450-004	102	99	95	70-130	
PZAA-P4-102412	P1204450-004DUP	102	97	96	70-130	
PZAA-P5-102412	P1204450-005	101	100	94	70-130	
PZAA-P6-102412	P1204450-006	101	99	95	70-130	
PZAA-P7-102412	P1204450-007	102	98	94	70-130	
PZAA-P8-102412	P1204450-008	102	99	97	70-130	
PZAA-C1-102412	P1204450-009	102	98	96	70-130	
PZAA-C2-102412	P1204450-010	103	98	96	70-130	
PZAA-C3-102412	P1204450-011	102	99	98	70-130	
PZAA-C4-102412	P1204450-012	101	100	97	70-130	
PZAA-C3-102412-D	P1204450-013	102	100	97	70-130	

Surrogate percent recovery is verified and accepted based on the on-column result.

Reported results are shown in concentration units and as a result of the calculation, may vary slightly from the on-column percent recovery.

LABORATORY CONTROL SAMPLE SUMMARY

Page 1 of 3

Client: CH2M Hill

Client Sample ID: Lab Control Sample

CAS Project ID: P1204450

Client Project ID: Pfizer Ambient Air Monitoring

CAS Sample ID: P121101-LCS

Test Code: EPA TO-15 Date Collected: NA
 Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: NA
 Analyst: Lusine Hakobyan Date Analyzed: 11/01/12
 Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 0.125 Liter(s)
 Test Notes:

CAS #	Compound	Spike Amount µg/m³	Result µg/m³	% Recovery	CAS	
					Acceptance Limits	Data Qualifier
115-07-1	Propene	204	164	80	59-137	
75-71-8	Dichlorodifluoromethane (CFC 12)	202	147	73	63-115	
74-87-3	Chloromethane	196	165	84	59-124	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	206	159	77	65-113	
75-01-4	Vinyl Chloride	200	170	85	59-121	
106-99-0	1,3-Butadiene	210	190	90	60-138	
74-83-9	Bromomethane	200	171	86	69-129	
75-00-3	Chloroethane	202	173	86	60-120	
64-17-5	Ethanol	958	816	85	58-121	
75-05-8	Acetonitrile	202	184	91	64-129	
107-02-8	Acrolein	204	162	79	54-127	
67-64-1	Acetone	1,040	829	80	59-114	
75-69-4	Trichlorofluoromethane	210	147	70	66-108	
67-63-0	2-Propanol (Isopropyl Alcohol)	396	366	92	50-113	
107-13-1	Acrylonitrile	206	198	96	72-135	
75-35-4	1,1-Dichloroethene	218	176	81	70-117	
75-09-2	Methylene Chloride	212	165	78	61-108	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	214	181	85	70-131	
76-13-1	Trichlorotrifluoroethane	212	168	79	70-113	
75-15-0	Carbon Disulfide	208	165	79	65-112	
156-60-5	trans-1,2-Dichloroethene	202	185	92	71-119	
75-34-3	1,1-Dichloroethane	206	172	83	71-116	
1634-04-4	Methyl tert-Butyl Ether	204	168	82	67-116	
108-05-4	Vinyl Acetate	988	850	86	59-142	
78-93-3	2-Butanone (MEK)	212	181	85	68-125	

Laboratory Control Sample percent recovery is verified and accepted based on the on-column result.
 Reported results are shown in concentration units and as a result of the calculation, may vary slightly.

LABORATORY CONTROL SAMPLE SUMMARY

Page 2 of 3

Client: CH2M Hill

Client Sample ID: Lab Control Sample

Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450

CAS Sample ID: P121101-LCS

Test Code: EPA TO-15 Date Collected: NA
 Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: NA
 Analyst: Lusine Hakobyan Date Analyzed: 11/01/12
 Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 0.125 Liter(s)
 Test Notes:

CAS #	Compound	Spike Amount µg/m³	Result µg/m³	% Recovery	CAS	
					Acceptance Limits	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	214	184	86	69-119	
141-78-6	Ethyl Acetate	412	382	93	63-130	
110-54-3	n-Hexane	206	164	80	57-120	
67-66-3	Chloroform	222	169	76	69-111	
109-99-9	Tetrahydrofuran (THF)	208	146	70	57-123	
107-06-2	1,2-Dichloroethane	208	164	79	70-118	
71-55-6	1,1,1-Trichloroethane	204	150	74	73-119	
71-43-2	Benzene	208	170	82	66-121	
56-23-5	Carbon Tetrachloride	212	159	75	74-129	
110-82-7	Cyclohexane	402	305	76	70-113	
78-87-5	1,2-Dichloropropane	204	169	83	69-118	
75-27-4	Bromodichloromethane	204	159	78	75-124	
79-01-6	Trichloroethene	198	156	79	73-115	
123-91-1	1,4-Dioxane	206	166	81	71-123	
80-62-6	Methyl Methacrylate	414	366	88	72-127	
142-82-5	n-Heptane	202	163	81	68-120	
10061-01-5	cis-1,3-Dichloropropene	196	173	88	71-130	
108-10-1	4-Methyl-2-pentanone	210	179	85	69-130	
10061-02-6	trans-1,3-Dichloropropene	218	189	87	76-133	
79-00-5	1,1,2-Trichloroethane	202	163	81	73-120	
108-88-3	Toluene	208	160	77	67-111	
591-78-6	2-Hexanone	228	174	76	70-123	
124-48-1	Dibromochloromethane	216	172	80	75-129	
106-93-4	1,2-Dibromoethane	208	169	81	73-122	
123-86-4	n-Butyl Acetate	228	191	84	68-132	

Laboratory Control Sample percent recovery is verified and accepted based on the on-column result.
 Reported results are shown in concentration units and as a result of the calculation, may vary slightly.

LABORATORY CONTROL SAMPLE SUMMARY

Page 3 of 3

Client: CH2M Hill

Client Sample ID: Lab Control Sample

CAS Project ID: P1204450

Client Project ID: Pfizer Ambient Air Monitoring

CAS Sample ID: P121101-LCS

Test Code: EPA TO-15 Date Collected: NA
 Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16 Date Received: NA
 Analyst: Lusine Hakobyan Date Analyzed: 11/01/12
 Sampling Media: 6.0 L Summa Canister Volume(s) Analyzed: 0.125 Liter(s)
 Test Notes:

CAS #	Compound	Spike Amount µg/m³	Result µg/m³	% Recovery	CAS	
					Acceptance Limits	Data Qualifier
111-65-9	n-Octane	206	165	80	68-116	
127-18-4	Tetrachloroethene	190	145	76	67-119	
108-90-7	Chlorobenzene	208	161	77	69-113	
100-41-4	Ethylbenzene	206	158	77	71-117	
179601-23-1	m,p-Xylenes	412	304	74	70-116	
75-25-2	Bromoform	216	170	79	69-127	
100-42-5	Styrene	208	171	82	71-125	
95-47-6	o-Xylene	200	151	76	70-116	
111-84-2	n-Nonane	202	161	80	68-116	
79-34-5	1,1,2,2-Tetrachloroethane	198	153	77	70-119	
98-82-8	Cumene	196	148	76	70-116	
80-56-8	alpha-Pinene	192	150	78	71-119	
103-65-1	n-Propylbenzene	198	149	75	71-119	
622-96-8	4-Ethyltoluene	204	156	76	71-119	
108-67-8	1,3,5-Trimethylbenzene	208	155	75	71-121	
95-63-6	1,2,4-Trimethylbenzene	200	153	77	73-127	
100-44-7	Benzyl Chloride	206	174	84	65-137	
541-73-1	1,3-Dichlorobenzene	206	163	79	68-123	
106-46-7	1,4-Dichlorobenzene	212	158	75	65-120	
95-50-1	1,2-Dichlorobenzene	204	152	75	67-121	
5989-27-5	d-Limonene	206	170	83	67-130	
96-12-8	1,2-Dibromo-3-chloropropane	202	165	82	72-133	
120-82-1	1,2,4-Trichlorobenzene	200	154	77	62-133	
91-20-3	Naphthalene	178	132	74	56-138	
87-68-3	Hexachlorobutadiene	208	162	78	60-128	

Laboratory Control Sample percent recovery is verified and accepted based on the on-column result.
 Reported results are shown in concentration units and as a result of the calculation, may vary slightly.

LABORATORY DUPLICATE SUMMARY RESULTS

Page 1 of 3

Client: CH2M Hill

Client Sample ID: PZAA-P4-102412

Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450

CAS Sample ID: P1204450-004DUP

Test Code: EPA TO-15

Date Collected: 10/24/12

Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16

Date Received: 10/29/12

Analyst: Lusine Hakobyan

Date Analyzed: 11/1/12

Sampling Media: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:

Container ID: AC01811

Initial Pressure (psig): -3.28

Final Pressure (psig): 3.50

Canister Dilution Factor: 1.59

Compound	Sample Result		Duplicate Sample Result		Average	% RPD	RPD Limit	Data Qualifier
	µg/m³	ppbV	µg/m³	ppbV	µg/m³			
Propene	3.52	2.05	3.68	2.14	3.6	4	25	
Dichlorodifluoromethane (CFC 12)	2.12	0.429	1.96	0.397	2.04	8	25	
Chloromethane	0.566	0.274	0.412	0.200	0.489	31	25	R
1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	ND	ND	ND	-	-	25	
Vinyl Chloride	ND	ND	ND	ND	-	-	25	
1,3-Butadiene	0.402	0.182	0.386	0.175	0.394	4	25	
Bromomethane	ND	ND	ND	ND	-	-	25	
Chloroethane	ND	ND	ND	ND	-	-	25	
Ethanol	32.7	17.3	29.8	15.8	31.25	9	25	
Acetonitrile	1.04	0.618	0.957	0.570	0.9985	8	25	
Acrolein	6.30	2.75	6.03	2.63	6.165	4	25	
Acetone	123	51.8	114	48.2	118.5	8	25	
Trichlorofluoromethane	1.23	0.219	1.16	0.207	1.195	6	25	
2-Propanol (Isopropyl Alcohol)	12.9	5.27	11.6	4.74	12.25	11	25	
Acrylonitrile	ND	ND	ND	ND	-	-	25	
1,1-Dichloroethene	ND	ND	ND	ND	-	-	25	
Methylene Chloride	2.82	0.811	2.62	0.754	2.72	7	25	
3-Chloro-1-propene (Allyl Chloride)	ND	ND	ND	ND	-	-	25	
Trichlorotrifluoroethane	0.520	0.0679	0.480	0.0627	0.5	8	25	
Carbon Disulfide	ND	ND	ND	ND	-	-	25	
trans-1,2-Dichloroethene	ND	ND	ND	ND	-	-	25	
1,1-Dichloroethane	ND	ND	ND	ND	-	-	25	
Methyl tert-Butyl Ether	0.221	0.0613	0.202	0.0560	0.2115	9	25	
Vinyl Acetate	ND	ND	ND	ND	-	-	25	
2-Butanone (MEK)	8.94	3.03	8.02	2.72	8.48	11	25	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

R = Duplicate precision not met.

LABORATORY DUPLICATE SUMMARY RESULTS

Page 2 of 3

Client: CH2M Hill

Client Sample ID: PZAA-P4-102412

Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450

CAS Sample ID: P1204450-004DUP

Test Code: EPA TO-15

Date Collected: 10/24/12

Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16

Date Received: 10/29/12

Analyst: Lusine Hakobyan

Date Analyzed: 11/1/12

Sampling Media: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:

Container ID: AC01811

Initial Pressure (psig): -3.28

Final Pressure (psig): 3.50

Canister Dilution Factor: 1.59

Compound	Sample Result		Duplicate Sample Result		Average $\mu\text{g}/\text{m}^3$	% RPD	RPD Limit	Data Qualifier
	$\mu\text{g}/\text{m}^3$	ppbV	$\mu\text{g}/\text{m}^3$	ppbV				
cis-1,2-Dichloroethene	ND	ND	ND	ND	-	-	25	
Ethyl Acetate	7.07	1.96	6.78	1.88	6.925	4	25	
n-Hexane	1.70	0.482	1.60	0.455	1.65	6	25	
Chloroform	0.227	0.0466	0.221	0.0453	0.224	3	25	
Tetrahydrofuran (THF)	ND	ND	ND	ND	-	-	25	
1,2-Dichloroethane	0.382	0.0943	0.356	0.0880	0.369	7	25	
1,1,1-Trichloroethane	ND	ND	ND	ND	-	-	25	
Benzene	2.09	0.655	1.98	0.619	2.035	5	25	
Carbon Tetrachloride	0.436	0.0693	0.405	0.0645	0.4205	7	25	
Cyclohexane	ND	ND	ND	ND	-	-	25	
1,2-Dichloropropane	ND	ND	ND	ND	-	-	25	
Bromodichloromethane	ND	ND	ND	ND	-	-	25	
Trichloroethene	ND	ND	0.172	0.0320	-	-	25	
1,4-Dioxane	ND	ND	ND	ND	-	-	25	
Methyl Methacrylate	ND	ND	ND	ND	-	-	25	
n-Heptane	1.24	0.303	1.18	0.289	1.21	5	25	
cis-1,3-Dichloropropene	ND	ND	ND	ND	-	-	25	
4-Methyl-2-pentanone	ND	ND	ND	ND	-	-	25	
trans-1,3-Dichloropropene	ND	ND	ND	ND	-	-	25	
1,1,2-Trichloroethane	ND	ND	ND	ND	-	-	25	
Toluene	5.36	1.42	4.91	1.30	5.135	9	25	
2-Hexanone	0.817	0.200	0.803	0.196	0.81	2	25	
Dibromochloromethane	ND	ND	ND	ND	-	-	25	
1,2-Dibromoethane	ND	ND	ND	ND	-	-	25	
n-Butyl Acetate	ND	ND	ND	ND	-	-	25	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

LABORATORY DUPLICATE SUMMARY RESULTS

Page 3 of 3

Client: CH2M Hill

Client Sample ID: PZAA-P4-102412

Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450

CAS Sample ID: P1204450-004DUP

Test Code: EPA TO-15

Date Collected: 10/24/12

Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16

Date Received: 10/29/12

Analyst: Lusine Hakobyan

Date Analyzed: 11/1/12

Sampling Media: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:

Container ID: AC01811

Initial Pressure (psig): -3.28

Final Pressure (psig): 3.50

Canister Dilution Factor: 1.59

Compound	Sample Result		Duplicate Sample Result		Average	% RPD	RPD Limit	Data Qualifier
	µg/m³	ppbV	µg/m³	ppbV	µg/m³			
n-Octane	ND	ND	ND	ND	-	-	25	
Tetrachloroethene	0.256	0.0378	0.240	0.0354	0.248	6	25	
Chlorobenzene	ND	ND	ND	ND	-	-	25	
Ethylbenzene	0.825	0.190	ND	ND	-	-	25	
m,p-Xylenes	2.60	0.599	2.44	0.563	2.52	6	25	
Bromoform	ND	ND	ND	ND	-	-	25	
Styrene	ND	ND	ND	ND	-	-	25	
o-Xylene	ND	ND	ND	ND	-	-	25	
n-Nonane	ND	ND	ND	ND	-	-	25	
1,1,2,2-Tetrachloroethane	ND	ND	ND	ND	-	-	25	
Cumene	ND	ND	ND	ND	-	-	25	
alpha-Pinene	1.54	0.276	1.43	0.257	1.485	7	25	
n-Propylbenzene	ND	ND	ND	ND	-	-	25	
4-Ethyltoluene	ND	ND	ND	ND	-	-	25	
1,3,5-Trimethylbenzene	ND	ND	ND	ND	-	-	25	
1,2,4-Trimethylbenzene	ND	ND	ND	ND	-	-	25	
Benzyl Chloride	ND	ND	ND	ND	-	-	25	
1,3-Dichlorobenzene	ND	ND	ND	ND	-	-	25	
1,4-Dichlorobenzene	0.272	0.0452	0.253	0.0421	0.2625	7	25	
1,2-Dichlorobenzene	ND	ND	ND	ND	-	-	25	
d-Limonene	1.07	0.192	1.02	0.184	1.045	5	25	
1,2-Dibromo-3-chloropropane	ND	ND	ND	ND	-	-	25	
1,2,4-Trichlorobenzene	ND	ND	ND	ND	-	-	25	
Naphthalene	ND	ND	ND	ND	-	-	25	
Hexachlorobutadiene	ND	ND	ND	ND	-	-	25	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450

Method Blank Summary

Test Code:	EPA TO-15	
Instrument ID:	Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16	Lab File ID: 11011205.D
Analyst:	Lusine Hakobyan	Date Analyzed: 11/01/12
Sampling Media:	6.0 L Summa Canister(s)	Time Analyzed: 11:52
Test Notes:		

Client Sample ID	CAS Sample ID	Lab File ID	Time Analyzed
------------------	---------------	-------------	---------------

Lab Control Sample	P121101-LCS	11011207.D	12:58
PZAA-P1-102412	P1204450-001	11011210.D	15:23
PZAA-P2-102412	P1204450-002	11011211.D	15:57
PZAA-P3-102412	P1204450-003	11011213.D	17:09
PZAA-P4-102412	P1204450-004	11011215.D	18:17
PZAA-P5-102412	P1204450-005	11011216.D	18:51
PZAA-P6-102412	P1204450-006	11011217.D	19:24
PZAA-P7-102412	P1204450-007	11011218.D	19:58
PZAA-P8-102412	P1204450-008	11011219.D	20:32
PZAA-C1-102412	P1204450-009	11011220.D	21:06
PZAA-C2-102412	P1204450-010	11011221.D	21:40
PZAA-C3-102412	P1204450-011	11011222.D	22:14
PZAA-C4-102412	P1204450-012	11011223.D	22:48
PZAA-C3-102412-D	P1204450-013	11011224.D	23:21
PZAA-P4-102412 (Lab Duplicate)	P1204450-004DUP	11011225.D	10:03

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill
Client Project ID: Pfizer Ambient Air Monitoring

CAS Project ID: P1204450

Internal Standard Area and RT Summary

Test Code: EPA TO-15
Instrument ID: Tekmar AUTOCAN/Agilent 5975Cinert/6890N/MS16
Analyst: Lusine Hakobyan
Sampling Media: 6.0 L Summa Canister(s)
Test Notes:

Lab File ID: 11011204.D

Date Analyzed: 11/1/12

Time Analyzed: 11:08

	IS1 (BCM)		IS2 (DFB)		IS3 (CBZ)	
	AREA #	RT #	AREA #	RT #	AREA #	RT #
24 Hour Standard	145446	11.32	639237	13.52	316289	17.46
Upper Limit	203624	11.65	894932	13.85	442805	17.79
Lower Limit	87268	10.99	383542	13.19	189773	17.13

Client Sample ID						
01	Method Blank	183259	11.29	806340	13.51	401568
02	Lab Control Sample	178122	11.31	773610	13.52	379370
03	PZAA-P1-102412	185501	11.30	808345	13.51	397081
04	PZAA-P2-102412	175909	11.31	773284	13.51	378855
05	PZAA-P3-102412	190709	11.31	828159	13.51	406126
06	PZAA-P4-102412	176380	11.31	769661	13.51	384397
07	PZAA-P5-102412	177726	11.30	767338	13.51	373781
08	PZAA-P6-102412	179367	11.31	774151	13.51	381845
09	PZAA-P7-102412	145029	11.31	627187	13.51	317294
10	PZAA-P8-102412	141557	11.30	618172	13.51	309971
11	PZAA-C1-102412	145777	11.30	635027	13.51	320864
12	PZAA-C2-102412	142850	11.30	630410	13.51	320237
13	PZAA-C3-102412	143598	11.30	629553	13.51	315287
14	PZAA-C4-102412	144751	11.30	627196	13.51	311044
15	PZAA-C3-102412-D	143843	11.31	625674	13.51	312187
16	PZAA-P4-102412 (Lab Duplicate)	192086	11.29	828306	13.51	419061
17						
18						
19						
20						

IS1 (BCM) = Bromochloromethane

IS2 (DFB) = 1,4-Difluorobenzene

IS3 (CBZ) = Chlorobenzene-d5

AREA UPPER LIMIT = 140% of internal standard area

AREA LOWER LIMIT = 60% of internal standard area

RT UPPER LIMIT = 0.33 minutes of internal standard RT

RT LOWER LIMIT = 0.33 minutes of internal standard RT

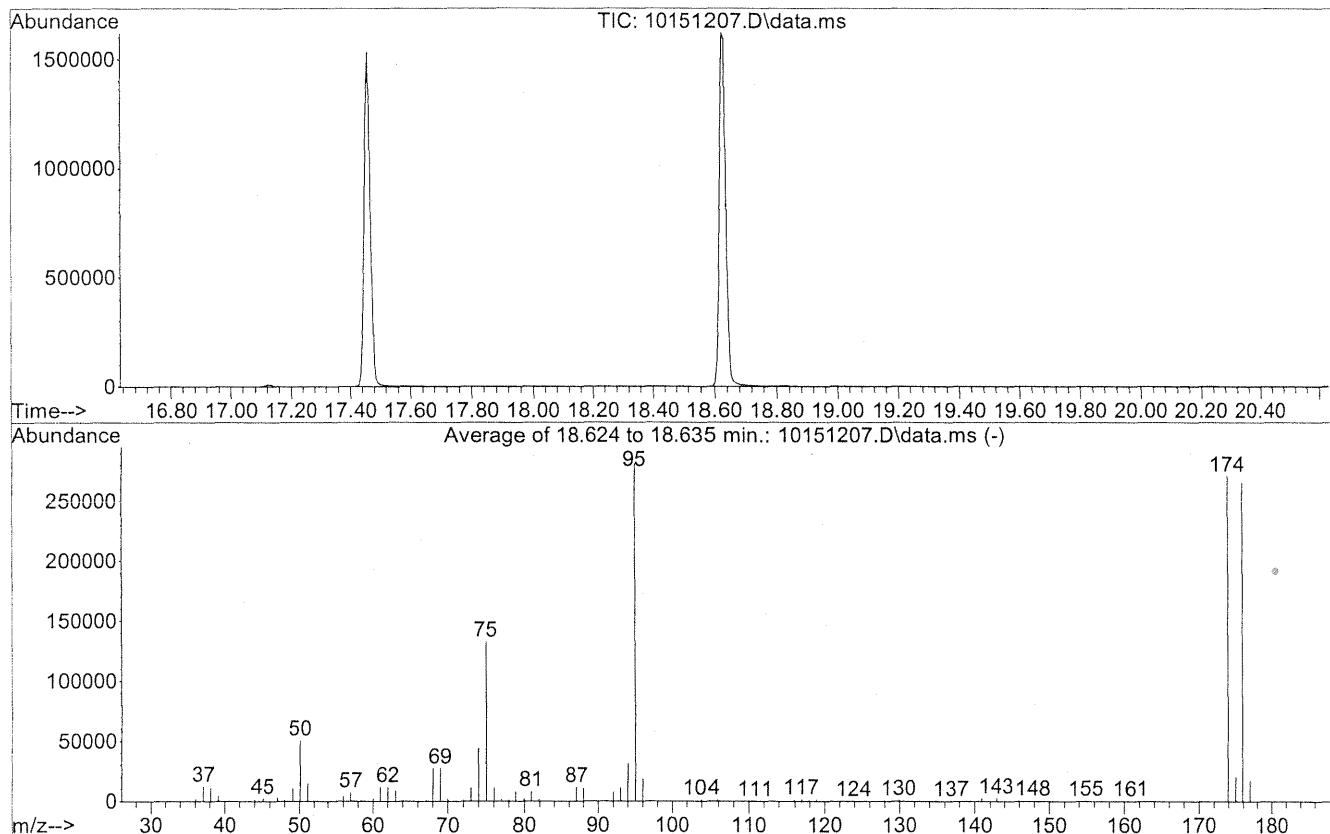
Column used to flag values outside QC limits with an I.

I = Internal standard not within the specified limits.

Data Path : J:\MS16\DATA\2012_10\15\
 Data File : 10151207.D
 Acq On : 15 Oct 2012 14:29
 Operator : LH
 Sample : 12.5ng TO-15 BFB
 Misc : S25-09261201
 ALS Vial : 2 Sample Multiplier: 1

Integration File: RTEINT.P

Method : J:\MS16\METHODS\R16101512.M
 Title : EPA TO-15 per SOP VOA-TO15 (CASS TO-15/GC-MS)
 Last Update : Mon Jul 16 09:59:54 2012



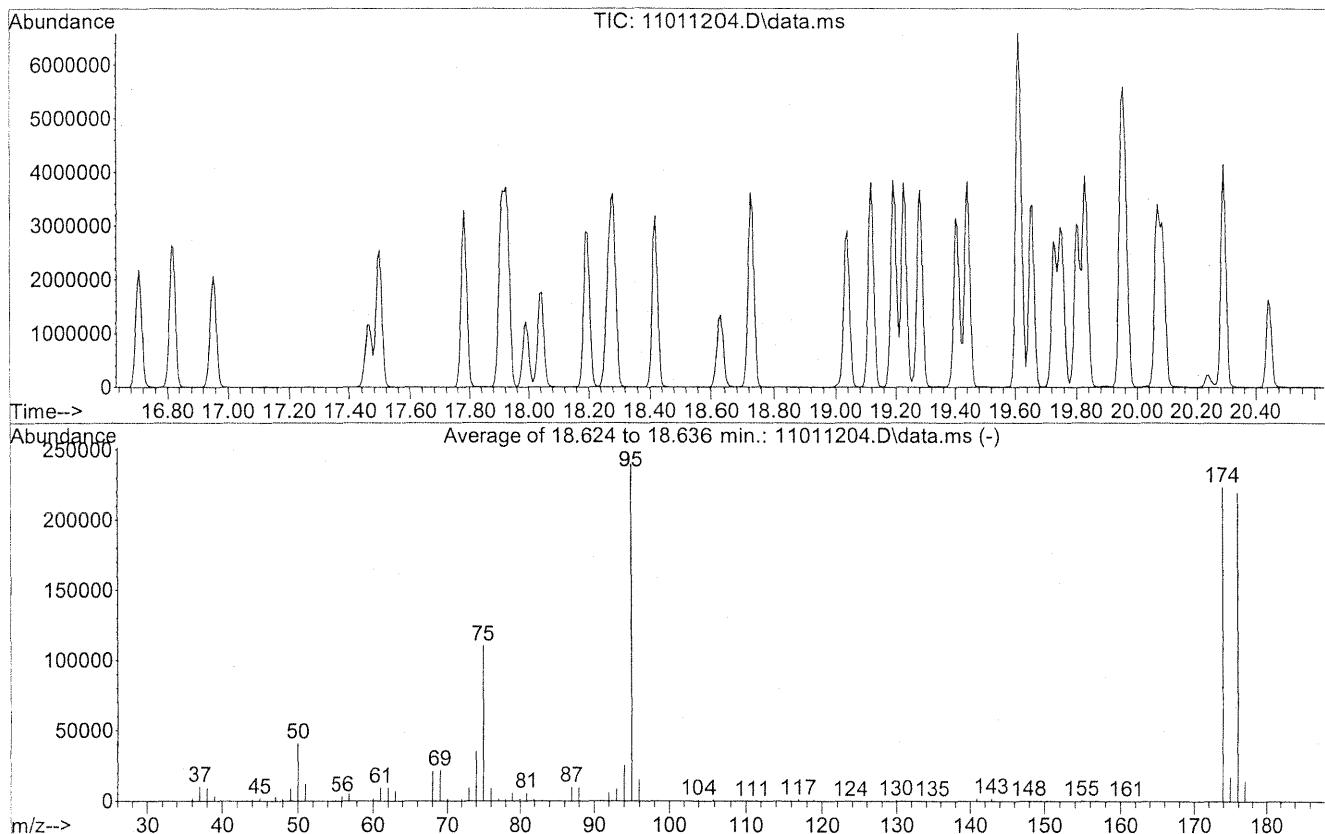
AutoFind: Scans 2695, 2696, 2697; Background Corrected with Scan 2688

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	8	40	18.0	50525	PASS
75	95	30	66	47.1	132416	PASS
95	95	100	100	100.0	280917	PASS
96	95	5	9	6.6	18414	PASS
173	174	0.00	2	0.0	0	PASS
174	95	50	120	96.4	270763	PASS
175	174	4	9	7.5	20197	PASS
176	174	93	101	98.0	265259	PASS
177	176	5	9	6.5	17347	PASS

Data Path : J:\MS16\DATA\2012_11\01\
 Data File : 11011204.D
 Acq On : 1 Nov 2012 11:08
 Operator : LH
 Sample : 25ng TO-15 CCV STD
 Misc : S25-10231201/S25-10081201
 ALS Vial : 2 Sample Multiplier: 1

Integration File: RTEINT.P

Method : J:\MS16\METHODS\R16101512.M
 Title : EPA TO-15 per SOP VOA-TO15 (CASS TO-15/GC-MS)
 Last Update : Tue Oct 16 08:54:07 2012



AutoFind: Scans 2695, 2696, 2697; Background Corrected with Scan 2688

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	8	40	17.1	40840	PASS
75	95	30	66	46.1	110304	PASS
95	95	100	100	100.0	239445	PASS
96	95	5	9	6.5	15477	PASS
173	174	0.00	2	0.0	0	PASS
174	95	50	120	93.3	223445	PASS
175	174	4	9	7.7	17216	PASS
176	174	93	101	98.1	219200	PASS
177	176	5	9	6.6	14553	PASS

Response Factor Report GCMS-16

Method Path : J:\MS16\METHODS\

Method File : R16101512.M

Title : EPA TO-15 per SOP VOA-TO15 (CASS TO-15/GC-MS)

Last Update : Tue Oct 16 08:54:07 2012

Response Via : Initial Calibration

Calibration Files
 0.1 =10151208.D 0.2 =10151209.D 0.5 =10151210.D 1.0 =10151211.D 5.0 =10151212.D 25 =10151213.D
 50 =10151214.D 100 =10151215.D

	Compound	0.1	0.2	0.5	1.0	5.0	25	50	100	Avg	%RSD
1) IR	Bromochloromethane . . .										
2) T	Propene	1.443	1.913	2.126	2.052	2.224	2.046	1.479	1.898	16.49	
3) T	Dichlorodifluo . . .	2.761	3.284	3.404	3.187	3.225	3.185	2.836	2.134	3.002	13.79
4) T	Chloromethane	1.811	2.101	2.177	2.032	2.061	2.109	1.917	1.433	1.955	12.31
5) T	1, 2-Dichloro-1 . . .	1.353	1.529	1.610	1.560	1.562	1.539	1.367	1.028	1.444	13.31
6) T	Vinyl Chloride	1.572	1.954	2.070	1.937	1.992	2.033	1.841	1.421	1.852	12.60
7) T	1, 3-Butadiene	1.074	1.355	1.427	1.358	1.428	1.505	1.358	1.047	1.319	12.70
8) T	Bromomethane	1.123	1.373	1.417	1.268	1.278	1.326	1.171	0.886	1.230	13.78
9) T	Chloroethane	0.798	1.018	1.025	1.004	1.004	1.023	0.925	0.712	0.939	12.79
10) T	Ethanol	0.916	1.081	1.110	1.054	1.054	1.074	0.980	0.755	1.003	11.75
11) T	Acetonitrile	2.339	2.529	2.494	2.260	2.187	2.272	2.117	1.680	2.235	11.84
12) T	Acrolein	0.532	0.737	0.701	0.714	0.741	0.687	0.542	0.665	13.44	
13) T	Acetone	0.833	0.982	0.983	0.923	0.911	0.878	0.777	0.574	0.858	15.67
14) T	Trichlorofluor . . .	2.518	2.986	3.016	2.884	2.879	2.878	2.593	1.971	2.715	12.86
15) T	2-Propanol (Is . . .)										
16) T	Acrylonitrile	3.033	2.230	2.293	2.050	1.755	1.427	2.131	2.131	2.131	25.64
17) T	1, 1-Dichloroet . . .	1.417	1.425	1.509	1.617	1.518	1.183	1.445	1.445	1.445	10.23
18) T	2-Methyl-2-Pro . . .	1.044	1.303	1.324	1.302	1.305	1.309	1.188	0.913	1.211	12.69
19) T	Methylene Chlo . . .	3.714	3.809	3.511	3.574	3.386					
20) T	3-Chloro-1-pro . . .	1.835	2.139	2.124	1.986	1.961	2.057	1.914	1.506	1.940	10.48
21) T	Trichlorotrifl . . .	1.000	1.336	1.369	1.305	1.312	1.309	1.185	0.905	1.215	14.19
22) T	Carbon Disulfide	4.627	5.210	5.224	4.855	4.897	4.964	4.514	3.412	4.713	12.33
23) T	trans-1, 2-Dich . . .	1.215	1.791	1.950	1.918	2.045	2.082	1.915	1.482	1.800	16.70
24) T	1, 1-Dichloroet . . .	2.150	2.575	2.633	2.493	2.495	2.509	2.286	1.751	2.361	12.39
25) T	Methyl tert-Bu . . .	3.627	4.313	4.382	4.252	4.260	4.256	3.877	2.929	3.987	12.51
26) T	Vinyl Acetate										
27) T	2-Butanone (MEK)										
28) T	cis-1, 2-Dichlo . . .	1.496	1.883	1.941	1.897	1.922	1.973	1.800	1.367	1.785	12.68
29) T	Diisopropyl Ether	1.130	1.153	1.149	1.066	1.054	1.000	0.843	0.571	0.996	20.03
30) T	Ethyl Acetate	0.235	0.379	0.459	0.465	0.491	0.479	0.404	0.273	0.398	24.35
31) T	n-Hexane	2.016	2.469	2.440	2.320	2.285	2.138	1.819	1.222	2.089	19.76

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Revised Page

Method Path : J:\MS16\METHODS\

Method File : R16101512.M

Title : EPA TO-15 per SOP VOA-TO15 (CASS TO-15/GC-MS)

32) T	Chloroform	2.143	2.481	2.504	2.387	2.418	2.436	2.216	1.691	2.284	11.88
33) S	1, 2-Dichloroet...	1.530	1.527	1.535	1.524	1.517	1.513	1.503	1.507	1.519	0.75
34) T	Tetrahydrofura...	1.108	1.181	1.353	0.904	0.856	0.833	0.747	0.572	0.944	26.82
35) T	Ethyl tert-But...	1.351	1.661	1.724	1.651	1.675	1.673	1.508	1.112	1.544	13.77
36) T	1, 2-Dichloroet...	1.689	1.978	2.048	1.992	2.037	2.076	1.876	1.422	1.890	11.99
37) IR	1, 4-Difluorobenzen...	0.490	0.585	0.577	0.545	0.564	0.571	0.525	0.397	0.532	11.81
38) T	1,1,1-Trichlor...	0.156	0.194	0.198	0.193	0.201	0.198	0.176	0.130	0.181	14.09
39) T	Isopropyl Acetate	0.203	0.258	0.299	0.299	0.319	0.331	0.294	0.226	0.278	16.24
40) T	1-Butanol	1.121	1.281	1.304	1.220	1.219	1.207	1.075	0.803	1.154	13.92
41) T	Benzene	0.383	0.443	0.471	0.454	0.468	0.486	0.444	0.337	0.436	11.55
42) T	Carbon Tetrach...	0.453	0.528	0.527	0.494	0.493	0.474	0.412	0.288	0.459	17.16
43) T	Cyclohexane	0.345	0.825	0.974	0.992	0.945	0.979	0.985	0.888	0.662	0.906
44) T	tert-Amyl Meth...	0.274	0.328	0.340	0.320	0.326	0.326	0.333	0.303	0.230	0.307
45) T	1, 2-Dichloropr...	0.369	0.444	0.462	0.444	0.470	0.477	0.435	0.327	0.428	12.33
46) T	Bromodichlorom...	0.390	0.389	0.389	0.371	0.384	0.384	0.345	0.252	0.358	12.98
47) T	Trichloroethene	0.191	0.247	0.247	0.265	0.256	0.266	0.268	0.241	0.178	0.239
48) T	1, 4-Dioxane	1.262	1.457	1.492	1.378	1.387	1.387	1.250	0.924	1.317	14.75
49) T	2, 2, 4-Trimethyl...	0.080	0.111	0.126	0.131	0.139	0.138	0.122	0.088	0.117	19.14
50) T	Methyl Methacry...	0.267	0.320	0.333	0.323	0.321	0.321	0.289	0.214	0.299	13.65
51) T	n-Heptane	0.346	0.426	0.498	0.488	0.535	0.555	0.501	0.373	0.465	16.27
52) T	cis-1, 3-Dichl...	0.199	0.270	0.285	0.289	0.304	0.310	0.280	0.211	0.268	15.38
53) T	4-Methyl-2-pen...	0.402	0.415	0.486	0.524	0.473	0.360	0.444	13.81		
54) T	trans-1, 3-Dich...	0.254	0.311	0.329	0.323	0.330	0.332	0.297	0.220	0.299	13.80
55) T	1, 1, 2-Trichlor...										
56) IR	Chlorobenzene-d5	2.131	2.151	2.135	2.145	2.146	2.167	2.163	2.129	2.146	0.65
57) S	Toluene-d8 (SS2)	2.601	2.946	2.950	2.833	2.833	2.766	2.397	1.672	2.625	16.27
58) T	Toluene	1.253	1.559	1.454	1.422	1.448	1.532	1.388	1.044	1.387	12.05
59) T	2-Hexanone	0.603	0.709	0.740	0.737	0.805	0.857	0.768	0.562	0.723	13.59
60) T	Dibromochlorom...	0.554	0.675	0.757	0.746	0.797	0.828	0.745	0.545	0.706	15.02
61) T	1, 2-Dibromoethane	0.515	0.635	0.638	0.607	0.605	0.612	0.541	0.394	0.568	14.58
62) T	n-Butyl Acetate	0.789	0.961	0.988	0.944	0.963	0.960	0.850	0.590	0.881	15.41
63) T	n-Octane	1.617	1.939	1.965	1.877	1.900	1.891	1.619	1.137	1.743	16.09
64) T	Tetrachloroethene	2.947	3.361	3.380	3.224	3.263	3.201	2.748	1.905	3.004	16.41
65) T	Chlorobenzene	2.509	2.675	2.716	2.606	2.625	2.531	2.166	1.445	2.409	17.63
66) T	m- & p-Xylenes	0.521	0.626	0.664	0.674	0.756	0.828	0.748	0.544	0.670	15.83
67) T	Bromoform	1.462	1.809	1.866	1.850	1.981	1.970	1.733	1.207	1.735	15.48
68) T	Styrene	2.485	2.950	2.885	2.761	2.766	2.680	2.302	1.552	2.548	17.82
69) T	o-Xylene										

Revised Page

Method Path : J:\MS16\METHODS\

Method File : R16101512.M

Title : EPA TO-15 per SOP VOA-TO15 (CASS TO-15/GC-MS)

71) T	n-Nonane	1.356	1.578	1.551	1.467	1.466	1.494	1.333	0.968	1.402	13.89
72) T	1,1,2,2-Tetrac...	0.978	1.209	1.284	1.241	1.278	1.277	1.119	0.762	1.143	16.28
73) S	Bromofluoroben...	1.085	1.092	1.092	1.099	1.102	1.107	1.110	1.100	1.098	0.75
74) T	Cumene	3.250	3.669	3.669	3.512	3.514	3.381	2.880	1.932	3.226	18.06
75) T	alpha-Pinene	1.476	1.795	1.812	1.744	1.761	1.719	1.494	1.036	1.605	16.47
76) T	n-Propylbenzene	3.782	4.368	4.349	4.205	4.241	4.094	3.511	2.348	3.862	17.58
77) T	3-Ethyltoluene	2.736	3.375	3.316	3.237	3.346	3.189	2.846	1.990	3.005	15.74
78) T	4-Ethyltoluene	2.719	3.213	3.378	3.252	3.169	3.137	2.552	1.629	2.881	20.09
79) T	1,3,5-Trimethyl...	2.676	3.007	2.985	2.783	2.779	2.702	2.315	1.566	2.601	18.06
80) T	alpha-Methylst...	1.106	1.404	1.500	1.491	1.526	1.463	1.277	0.873	1.330	17.47
81) T	2-Ethyltoluene	3.104	3.588	3.583	3.448	3.397	3.302	2.835	1.906	3.145	17.83
82) T	1,2,4-Trimethyl...	2.528	2.890	2.915	2.793	2.834	2.604	2.099	1.261	2.490	22.66
83) T	n-Decane	1.350	1.510	1.567	1.530	1.542	1.572	1.399	0.982	1.432	13.87
84) T	Benzyl Chloride	1.570	1.762	1.789	2.163	2.492	2.253	1.549	1.940	18.79	
85) T	1,3-Dichlorob...	1.290	1.555	1.606	1.601	1.683	1.666	1.448	0.976	1.478	16.24
86) T	1,4-Dichlorob...	1.490	1.740	1.763	1.682	1.730	1.709	1.464	0.960	1.567	17.28
87) T	sec-Butylbenzene	3.207	3.790	3.821	3.727	3.746	3.612	3.062	1.982	3.368	18.63
88) T	4-Isopropyltol...	3.109	3.596	3.741	3.651	3.657	3.394	2.775	1.681	3.201	21.76
89) T	1,2,3-Trimethyl...	2.565	2.974	3.001	2.910	2.917	2.770	2.316	1.463	2.614	19.93
90) T	1,2-Dichlorob...	1.347	1.630	1.645	1.620	1.653	1.616	1.401	0.934	1.481	16.93
91) T	d-Limonene	0.863	0.993	1.052	1.046	1.063	1.023	0.905	0.624	0.946	15.74
92) T	1,2-Dibromo-3-...	0.393	0.470	0.527	0.527	0.608	0.669	0.603	0.433	0.529	17.88
93) T	n-Undecane	1.387	1.486	1.581	1.532	1.563	1.595	1.407	0.990	1.443	13.77
94) T	1,2,4-Trichlor...	1.035	1.228	1.273	1.257	1.344	1.414	1.218	0.830	1.200	15.45
95) T	Naphthalene	3.474	3.981	4.060	3.992	4.357	4.484	3.899	2.588	3.854	15.43
96) T	n-Dodecane	1.267	1.482	1.568	1.554	1.563	1.672	1.477	1.051	1.454	13.78
97) T	Hexachlorobuta...	0.759	0.864	0.883	0.835	0.874	0.907	0.806	0.551	0.810	14.18
98) T	Cyclohexanone	1.014	1.118	1.040	0.998	1.001	1.061	0.979	0.732	0.993	11.50
99) T	tert-Butylbenzene	2.488	2.897	2.893	2.813	2.789	2.517	2.018	1.234	2.456	23.41
100) T	n-Butylbenzene	2.468	2.858	2.986	2.889	2.934	2.868	2.459	1.629	2.636	17.28

(##) = Out of Range

Evaluate Continuing Calibration Report

Data Path : J:\MS16\DATA\2012_11\01\
 Data File : 11011204.D
 Acq On : 1 Nov 2012 11:08
 Operator : LH
 Sample : 25ng TO-15 CCV STD
 Misc : S25-10231201/S25-10081201
 ALS Vial : 2 Sample Multiplier: 1

Quant Time: Nov 01 11:52:55 2012
 Quant Method : J:\MS16\METHODS\R16101512.M
 Quant Title : EPA TO-15 per SOP VOA-TO15 (CASS TO-15/GC-MS)
 QLast Update : Tue Oct 16 08:54:07 2012
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 200%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	IR Bromochloromethane (IS1)	1.000	1.000	0.0	98	-0.01
2	T Propene	1.898	2.105	-10.9	93	0.00
3	T Dichlorodifluoromethane (CF	3.002	2.969	1.1	92	0.00
4	T Chloromethane	1.955	2.324	-18.9	108	0.00
5	T 1,2-Dichloro-1,1,2,2-tetraf	1.444	1.469	-1.7	94	0.00
6	T Vinyl Chloride	1.852	2.098	-13.3	101	0.00
7	T 1,3-Butadiene	1.319	1.574	-19.3	103	0.00
8	T Bromomethane	1.230	1.388	-12.8	103	-0.01
9	T Chloroethane	0.939	1.099	-17.0	105	0.00
10	T Ethanol	1.003	1.170	-16.7	107	-0.07
11	T Acetonitrile	2.235	2.525	-13.0	109	-0.03
12	T Acrolein	0.665	0.826	-24.2	110	-0.02
13	T Acetone	0.858	0.929	-8.3	104	-0.04
14	T Trichlorofluoromethane	2.715	2.747	-1.2	94	0.00
15	T 2-Propanol (Isopropanol)	2.131	2.756	-29.3	132	-0.04
16	T Acrylonitrile	1.445	1.748	-21.0	106	-0.02
17	T 1,1-Dichloroethene	1.211	1.333	-10.1	100	0.00
18	T 2-Methyl-2-Propanol (tert-B	3.599	3.443	4.3	100	-0.02
19	T Methylene Chloride	1.302	1.349	-3.6	101	-0.02
20	T 3-Chloro-1-propene (Allyl C	1.940	2.249	-15.9	107	-0.01
21	T Trichlorotrifluoroethane	1.215	1.302	-7.2	98	0.00
22	T Carbon Disulfide	4.713	5.203	-10.4	103	-0.01
23	T trans-1,2-Dichloroethene	1.800	2.215	-23.1	105	-0.01
24	T 1,1-Dichloroethane	2.361	2.621	-11.0	103	-0.01
25	T Methyl tert-Butyl Ether	3.987	4.363	-9.4	101	0.00
26	T Vinyl Acetate	0.255	0.291	-14.1	97	-0.03
27	T 2-Butanone (MEK)	0.756	0.870	-15.1	99	-0.02
28	T cis-1,2-Dichloroethene	1.785	2.030	-13.7	101	-0.01
29	T Diisopropyl Ether	0.996	0.997	-0.1	98	0.00
30	T Ethyl Acetate	0.398	0.497	-24.9	102	-0.02
31	T n-Hexane	2.089	2.230	-6.7	102	0.00
32	T Chloroform	2.284	2.388	-4.6	96	-0.02
33	S 1,2-Dichloroethane-d4 (SS1)	1.519	1.522	-0.2	99	-0.01
34	T Tetrahydrofuran (THF)	0.944	0.876	7.2	103	-0.01
35	T Ethyl tert-Butyl Ether	1.544	1.661	-7.6	98	-0.01
36	T 1,2-Dichloroethane	1.890	1.987	-5.1	94	-0.01
37	IR 1,4-Difluorobenzene (IS2)	1.000	1.000	0.0	104	-0.01
38	T 1,1,1-Trichloroethane	0.532	0.510	4.1	93	0.00

Evaluate Continuing Calibration Report

Data Path : J:\MS16\DATA\2012_11\01\
 Data File : 11011204.D
 Acq On : 1 Nov 2012 11:08
 Operator : LH
 Sample : 25ng TO-15 CCV STD
 Misc : S25-10231201/S25-10081201
 ALS Vial : 2 Sample Multiplier: 1

Quant Time: Nov 01 11:52:55 2012
 Quant Method : J:\MS16\METHODS\R16101512.M
 Quant Title : EPA TO-15 per SOP VOA-TO15 (CASS TO-15/GC-MS)
 QLast Update : Tue Oct 16 08:54:07 2012
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 200%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
39 T	Isopropyl Acetate	0.181	0.198	-9.4	105	-0.02
40 T	1-Butanol	0.278	0.318	-14.4	100	-0.04
41 T	Benzene	1.154	1.176	-1.9	102	-0.01
42 T	Carbon Tetrachloride	0.436	0.433	0.7	93	-0.01
43 T	Cyclohexane	0.459	0.457	0.4	101	-0.01
44 T	tert-Amyl Methyl Ether	0.906	0.953	-5.2	101	0.00
45 T	1,2-Dichloropropane	0.307	0.334	-8.8	105	-0.01
46 T	Bromodichloromethane	0.428	0.442	-3.3	97	-0.01
47 T	Trichloroethene	0.358	0.358	0.0	97	0.00
48 T	1,4-Dioxane	0.239	0.258	-7.9	101	-0.01
49 T	2,2,4-Trimethylpentane (Iso)	1.317	1.409	-7.0	106	0.00
50 T	Methyl Methacrylate	0.117	0.136	-16.2	103	-0.01
51 T	n-Heptane	0.299	0.314	-5.0	101	-0.01
52 T	cis-1,3-Dichloropropene	0.465	0.542	-16.6	102	0.00
53 T	4-Methyl-2-pentanone	0.268	0.309	-15.3	104	-0.01
54 T	trans-1,3-Dichloropropene	0.444	0.505	-13.7	100	0.00
55 T	1,1,2-Trichloroethane	0.299	0.319	-6.7	100	0.00
56 IR	Chlorobenzene-d5 (IS3)	1.000	1.000	0.0	109	0.00
57 S	Toluene-d8 (SS2)	2.146	2.159	-0.6	108	0.00
58 T	Toluene	2.625	2.603	0.8	102	-0.01
59 T	2-Hexanone	1.387	1.449	-4.5	103	-0.01
60 T	Dibromochloromethane	0.723	0.749	-3.6	95	0.00
61 T	1,2-Dibromoethane	0.706	0.751	-6.4	98	0.00
62 T	n-Butyl Acetate	1.553	1.811	-16.6	105	0.00
63 T	n-Octane	0.568	0.598	-5.3	106	-0.01
64 T	Tetrachloroethene	0.881	0.876	0.6	99	0.00
65 T	Chlorobenzene	1.743	1.744	-0.1	100	0.00
66 T	Ethylbenzene	3.004	2.988	0.5	101	0.00
67 T	m- & p-Xylenes	2.409	2.364	1.9	101	-0.01
68 T	Bromoform	0.670	0.739	-10.3	97	0.00
69 T	Styrene	1.735	1.808	-4.2	100	0.00
70 T	o-Xylene	2.548	2.509	1.5	102	-0.01
71 T	n-Nonane	1.402	1.459	-4.1	106	0.00
72 T	1,1,2,2-Tetrachloroethane	1.143	1.189	-4.0	101	0.00
73 S	Bromofluorobenzene (SS3)	1.098	1.075	2.1	105	0.00
74 T	Cumene	3.226	3.153	2.3	101	0.00
75 T	alpha-Pinene	1.605	1.554	3.2	98	0.00
76 T	n-Propylbenzene	3.862	3.793	1.8	101	0.00

Evaluate Continuing Calibration Report

Data Path : J:\MS16\DATA\2012_11\01\
 Data File : 11011204.D
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 Operator : LH
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 Quant Title : EPA TO-15 per SOP VOA-TO15 (CASS TO-15/GC-MS)
 QLast Update : Tue Oct 16 08:54:07 2012
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 200%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
77 T	3-Ethyltoluene	3.005	2.984	0.7	102	0.00
78 T	4-Ethyltoluene	2.881	2.892	-0.4	100	-0.01
79 T	1,3,5-Trimethylbenzene	2.601	2.497	4.0	100	0.00
80 T	alpha-Methylstyrene	1.330	1.215	8.6	90	-0.01
81 T	2-Ethyltoluene	3.145	3.018	4.0	99	0.00
82 T	1,2,4-Trimethylbenzene	2.490	2.400	3.6	100	0.00
83 T	n-Decane	1.432	1.512	-5.6	104	0.00
84 T	Benzyl Chloride	1.940	2.271	-17.1	99	-0.01
85 T	1,3-Dichlorobenzene	1.478	1.520	-2.8	99	0.00
86 T	1,4-Dichlorobenzene	1.567	1.561	0.4	99	0.00
87 T	sec-Butylbenzene	3.368	3.314	1.6	100	0.00
88 T	4-Isopropyltoluene (p-Cymen	3.201	3.173	0.9	101	0.00
89 T	1,2,3-Trimethylbenzene	2.614	2.549	2.5	100	-0.01
90 T	1,2-Dichlorobenzene	1.481	1.469	0.8	99	-0.01
91 T	d-Limonene	0.946	0.874	7.6	93	0.00
92 T	1,2-Dibromo-3-Chloropropane	0.529	0.604	-14.2	98	0.00
93 T	n-Undecane	1.443	1.597	-10.7	109	0.00
94 T	1,2,4-Trichlorobenzene	1.200	1.318	-9.8	101	0.00
95 T	Naphthalene	3.854	4.191	-8.7	101	-0.01
96 T	n-Dodecane	1.454	1.726	-18.7	112	0.00
97 T	Hexachlorobutadiene	0.810	0.857	-5.8	102	0.00
98 T	Cyclohexanone	0.993	1.024	-3.1	105	-0.01
99 T	tert-Butylbenzene	2.456	2.337	4.8	101	-0.01
100 T	n-Butylbenzene	2.636	2.644	-0.3	100	0.00

(#) = Out of Range

SPCC's out = 0 CCC's out = 0

Columbia Analytical Services, Inc.
 2655 Park Center Drive, Suite A
 Simi Valley, CA 93065
 Ph. 805-526-7161
 Fax 805-526-7270

<u>Container IDs</u>	<u>Cleaned Date</u>	<u>Date Analyzed</u>	<u>QC Results</u>	<u>Comments</u>
AC00426	10/11/12	10/16/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC00596	10/11/12	10/16/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC00700	10/11/12	10/16/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC00720	10/11/12	10/16/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC00781	10/11/12	10/16/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01168	10/11/12	10/16/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01227	10/11/12	10/16/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01328	10/11/12	10/16/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01472	10/11/12	10/16/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01559	9/28/12	10/9/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01642	9/17/12	9/21/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01811	10/11/12	10/16/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01828	9/17/12	9/21/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01836	10/11/12	10/16/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01857	10/11/12	10/16/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01865	10/11/12	10/16/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
FCA00005	10/11/12	10/11/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
FCA00031	10/11/12	10/11/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
FCA00056	10/11/12	10/11/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
FCA00094	10/11/12	10/11/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
FCA00103	10/11/12	10/11/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
FCA00113	10/11/12	10/11/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
FCA00245	10/11/12	10/11/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
FCA00255	10/11/12	10/11/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
FCA00265	10/11/12	10/11/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
FCA00310	10/11/12	10/11/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
FCA00318	10/11/12	10/11/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
FCA00329	10/11/12	10/11/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)

* QC Canister

<u>Container IDs</u>	<u>Cleaned Date</u>	<u>Date Analyzed</u>	<u>QC Results</u>	<u>Comments</u>
FCA00421	10/11/12	10/11/12		
FCA00491	10/11/12	10/11/12		
FCA00528	10/11/12	10/11/12		
FCA00571	10/11/12	10/11/12		

* QC Canister

LABORATORY REPORT

July 31, 2013

Karen Mordock
CH2M Hill
1717 Arch Street, Suite 4400
Philadelphia, PA 19103

RE: Pfizer Ambient Air Monitoring / 431248.AM.FW

Dear Karen:

Your report number P1300088 has been amended for the samples submitted to our laboratory on January 9, 2013. The Privileged and Confidential water mark has been removed from all of the report pages. The revised pages have been indicated by the "Revised Page" footer located at the bottom right of the page.

All analyses were performed according to our laboratory's NELAP and DoD-ELAP-approved quality assurance program. The test results meet requirements of the current NELAP and DoD-ELAP standards, where applicable, and except as noted in the laboratory case narrative provided. For a specific list of NELAP and DoD-ELAP-accredited analytes, refer to the certifications section at www.caslab.com. Results are intended to be considered in their entirety and apply only to the samples analyzed and reported herein.

Columbia Analytical Services, Inc. dba ALS Environmental (ALS) is certified by the NELAP Laboratory Certificate No. 02115CA; Arizona Department of Health Services, Certificate No. AZ0694; Florida Department of Health, NELAP Certification E871020; New Jersey Department of Environmental Protection, NELAP Laboratory Certification ID #CA009; New York State Department of Health, NELAP NY Lab ID No: 11221; Oregon Environmental Laboratory Accreditation Program, NELAP ID: CA200007; The American Industrial Hygiene Association, Laboratory #101661; United States Department of Defense Environmental Laboratory Accreditation Program (DoD-ELAP), Certificate No. L11-203; Pennsylvania Registration No. 68-03307; TX Commission of Environmental Quality, NELAP ID T104704413-12-3; Minnesota Department of Health, NELAP Certificate No. 494864; Washington State Department of Ecology, ELAP Lab ID: C946, State of Utah Department of Health, NELAP Certificate No. CA015272012-2; State of Maine Laboratory Certification Program, Certificate No. 2012039. Each of the certifications listed above have an explicit Scope of Accreditation that applies to specific matrices/methods/analytes; therefore, please contact me for information corresponding to a particular certification.

If you have any questions, please call me at (805) 526-7161.

Respectfully submitted,

ALS | Environmental



By Kelly Horiuchi at 8:53 pm, Jul 31, 2013

Kelly Horiuchi
Laboratory Director

Client: CH2M Hill Service Request No: P1300088
Project: Pfizer Ambient Air Monitoring / 431248.AM.FW

CASE NARRATIVE

The samples were received intact under chain of custody on January 9, 2013 and were stored in accordance with the analytical method requirements. Please refer to the sample acceptance check form for additional information. The results reported herein are applicable only to the condition of the samples at the time of sample receipt.

Sulfur Analysis

The samples were analyzed for twenty sulfur compounds per ASTM D 5504-08 using a gas chromatograph equipped with a sulfur chemiluminescence detector (SCD). All compounds with the exception of hydrogen sulfide and carbonyl sulfide are quantitated against the initial calibration curve for methyl mercaptan. This method is not included on the laboratory's NELAP or DoD-ELAP scope of accreditation.

The results of analyses are given in the attached laboratory report. All results are intended to be considered in their entirety, and Columbia Analytical Services, Inc. dba ALS Environmental (ALS) is not responsible for utilization of less than the complete report.

Use of Columbia Analytical Services, Inc. dba ALS Environmental (ALS)'s Name. Client shall not use ALS's name or trademark in any marketing or reporting materials, press releases or in any other manner ("Materials") whatsoever and shall not attribute to ALS any test result, tolerance or specification derived from ALS's data ("Attribution") without ALS's prior written consent, which may be withheld by ALS for any reason in its sole discretion. To request ALS's consent, Client shall provide copies of the proposed Materials or Attribution and describe in writing Client's proposed use of such Materials or Attribution. If ALS has not provided written approval of the Materials or Attribution within ten (10) days of receipt from Client, Client's request to use ALS's name or trademark in any Materials or Attribution shall be deemed denied. ALS may, in its discretion, reasonably charge Client for its time in reviewing Materials or Attribution requests. Client acknowledges and agrees that the unauthorized use of ALS's name or trademark may cause ALS to incur irreparable harm for which the recovery of money damages will be inadequate. Accordingly, Client acknowledges and agrees that a violation shall justify preliminary injunctive relief. For questions contact the laboratory.

DETAIL SUMMARY REPORT

Client: CH2M Hill Service Request: P1300088
 Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

Date Received: 1/9/2013
 Time Received: 09:50

ASTM D5504-08 - Sulfur Bag

Client Sample ID	Lab Code	Matrix	Date Collected	Time Collected	
PZAA-C1a-010813	P1300088-001	Air	1/8/2013	17:18	X
PZAA-C1b-010813	P1300088-002	Air	1/8/2013	17:18	X
PZAA-C1c-010813	P1300088-003	Air	1/8/2013	17:30	X
PZAA-C2a-010813	P1300088-004	Air	1/8/2013	17:04	X
PZAA-C2b-010813	P1300088-005	Air	1/8/2013	16:58	X
PZAA-C2c-010813	P1300088-006	Air	1/8/2013	16:53	X
PZAA-C3a-010813	P1300088-007	Air	1/8/2013	17:47	X
PZAA-C3b-010813	P1300088-008	Air	1/8/2013	17:45	X
PZAA-C3c-010813	P1300088-009	Air	1/8/2013	18:00	X

Air - Chain of Custody Record & Analytical Service Request

 Page 1 of 1

 Requested Turnaround Time in Business Days (Surcharges) please circle
 1 Day (100%) 2 Day (75%) 3 Day (50%) 4 Day (35%) 5 Day (25%) 10 Day Standard

 CAS Project No. 13000555

Company Name & Address (Reporting Information)		Project Name Pfizer Ambient Air Monitoring		CAS Contact: K. Horvath					
Project Manager Karen Nordmark		Project Number 431240-AH-FW		Analysis Method					
Phone 247 685 6198		P.O. # / Billing Information Fax 215 6140 9212		Comments e.g. Actual Preservative or specific instructions <i>S2H + spurious Reduced Sulfur ASW D550</i>					
Email Address for Result Reporting Karen.Nordmark@chnm.com		Sampler (Print & Sign) Leslie Bierbauer							
Client Sample ID	Laboratory ID Number	Date Collected	Time Collected	Canister ID (Bar code # - AC, SC, etc.)	Flow Controller ID (Bar code # - FC #)	Canister Start Pressure "Hg	Canister End Pressure "Hg/psig	Sample Volume	
P2AA-C1a-010813	①	11/8/13	1718					67L	X
P2AA-C1b-010813	②		1718						X
P2AA-C1c-010813	③		1730						X
P2AA-C2a-010813	④		1704						X
P2AA-C2b-010813	⑤		1658						X
P2AA-C2c-010813	⑥		1653						X
P2AA-C3a-010813	⑦		1747						X
P2AA-C3b-010813	⑧		1745						X
P2AA-C3c-010813	⑨		1800						✓
Report Tier Levels - please select									Per SOW
Tier I - Results (Default if not specified) _____ Tier II (Results + QC Summaries) _____									EDD required Yes / No
Tier III (Results + QC & Calibration Summaries) _____ Tier IV (Data Validation Package) 10% SurchARGE _____									Project Requirements (MRLs, QAPP) Type: _____
Relinquished by: (Signature) <u>J. B.</u>									Date: <u>10/13</u> Time: <u>1900</u> Received by: (Signature) <u>J. Hellicic</u> Date: <u>10/13</u> Time: <u>1900</u> Received by: (Signature) <u>Melissa Sow</u>
Relinquished by: (Signature) _____									Time: <u> </u> Temperature: <u> </u>
Relinquished by: (Signature) _____									Time: <u> </u> Temperature: <u> </u>

Sample Acceptance Check Form

Client: CH2M Hill

Work order: P1300088

Project: Pfizer Ambient Air Monitoring / 431248.AM.FW

Sample(s) received on: 1/9/13

Date opened: 1/9/13

by: MZAMORA

Note: This form is used for all samples received by ALS. The use of this form for custody seals is strictly meant to indicate presence/absence and not as an indication of compliance or nonconformity. Thermal preservation and pH will only be evaluated either at the request of the client and/or as required by the method/SOP.

Yes **No** **N/A**

1 Were **sample containers** properly marked with client sample ID?

2 Container(s) **supplied by ALS**?

3 Did **sample containers** arrive in good condition?

4 Were **chain-of-custody** papers used and filled out?

5 Did **sample container labels** and/or tags agree with custody papers?

6 Was **sample volume** received adequate for analysis?

7 Are samples within specified holding times?

8 Was proper **temperature** (thermal preservation) of cooler at receipt adhered to?

9 Was a **trip blank** received?

10 Were **custody seals** on outside of cooler/Box?

Location of seal(s)? Top of box, covering opening.

Sealing Lid?

Were signature and date included?

Were seals intact?

Were custody seals on outside of sample container?

Location of seal(s)?

Sealing Lid?

Were signature and date included?

Were seals intact?

11 Do containers have appropriate **preservation**, according to method/SOP or Client specified information?

Is there a client indication that the submitted samples are **pH** preserved?

Were **VOA vials** checked for presence/absence of air bubbles?

Does the client/method/SOP require that the analyst check the sample pH and if necessary alter it?

12 **Tubes:** Are the tubes capped and intact?

Do they contain moisture?

13 **Badges:** Are the badges properly capped and intact?

Are dual bed badges separated and individually capped and intact?

Lab Sample ID	Container Description	Required pH *	Received pH	Adjusted pH	VOA Headspace (Presence/Absence)	Receipt / Preservation Comments
P1300088-001.01	10 L Tedlar Bag					
P1300088-002.01	10 L Tedlar Bag					
P1300088-003.01	10 L Tedlar Bag					
P1300088-004.01	10 L Tedlar Bag					
P1300088-005.01	10 L Tedlar Bag					
P1300088-006.01	10 L Tedlar Bag					
P1300088-007.01	10 L Tedlar Bag					
P1300088-008.01	10 L Tedlar Bag					

Explain any discrepancies: (include lab sample ID numbers):

Sample Acceptance Check Form

Client: CH2M Hill

Work order: P1300088

Project: Pfizer Ambient Air Monitoring / 431248.AM.FW

Sample(s) received on: 1/9/13

Date opened: 1/9/13

by: MZAMORA

Explain any discrepancies: (include lab sample ID numbers):

RSK - MEEPP, HCl (pH<2); RSK - CO₂, (pH 5-8); Sulfur (pH>4)

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C1a-010813

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300088

CAS Sample ID: P1300088-001

Test Code: ASTM D 5504-08
 Instrument ID: Agilent 6890A/GC13/SCD
 Analyst: Mike Conejo
 Sample Type: 10 L Tedlar Bag
 Test Notes:

Date Collected: 1/8/13
 Time Collected: 17:18
 Date Received: 1/9/13
 Date Analyzed: 1/9/13
 Time Analyzed: 11:20
 Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	23	7.0	17	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C1b-010813

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300088

CAS Sample ID: P1300088-002

Test Code: ASTM D 5504-08
 Instrument ID: Agilent 6890A/GC13/SCD
 Analyst: Mike Conejo
 Sample Type: 10 L Tedlar Bag
 Test Notes:

Date Collected: 1/8/13
 Time Collected: 17:18
 Date Received: 1/9/13
 Date Analyzed: 1/9/13
 Time Analyzed: 11:36
 Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C1c-010813

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300088

CAS Sample ID: P1300088-003

Test Code: ASTM D 5504-08
 Instrument ID: Agilent 6890A/GC13/SCD
 Analyst: Mike Conejo
 Sample Type: 10 L Tedlar Bag
 Test Notes:

Date Collected: 1/8/13
 Time Collected: 17:30
 Date Received: 1/9/13
 Date Analyzed: 1/9/13
 Time Analyzed: 12:11
 Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C2a-010813

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300088

CAS Sample ID: P1300088-004

Test Code: ASTM D 5504-08
 Instrument ID: Agilent 6890A/GC13/SCD
 Analyst: Mike Conejo
 Sample Type: 10 L Tedlar Bag
 Test Notes:

Date Collected: 1/8/13
 Time Collected: 17:04
 Date Received: 1/9/13
 Date Analyzed: 1/9/13
 Time Analyzed: 12:28
 Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C2b-010813

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300088

CAS Sample ID: P1300088-005

Test Code: ASTM D 5504-08
 Instrument ID: Agilent 6890A/GC13/SCD
 Analyst: Mike Conejo
 Sample Type: 10 L Tedlar Bag
 Test Notes:

Date Collected: 1/8/13
 Time Collected: 16:58
 Date Received: 1/9/13
 Date Analyzed: 1/9/13
 Time Analyzed: 13:40
 Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C2c-010813

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300088

CAS Sample ID: P1300088-006

Test Code:	ASTM D 5504-08	Date Collected:	1/8/13
Instrument ID:	Agilent 7890A/GC22/SCD	Time Collected:	16:53
Analyst:	Mike Conejo	Date Received:	1/9/13
Sample Type:	10 L Tedlar Bag	Date Analyzed:	1/9/13
Test Notes:		Time Analyzed:	13:39
		Volume(s) Analyzed:	1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C3a-010813

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300088

CAS Sample ID: P1300088-007

Test Code: ASTM D 5504-08
 Instrument ID: Agilent 7890A/GC22/SCD
 Analyst: Mike Conejo
 Sample Type: 10 L Tedlar Bag
 Test Notes:

Date Collected: 1/8/13
 Time Collected: 17:47
 Date Received: 1/9/13
 Date Analyzed: 1/9/13
 Time Analyzed: 12:24
 Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C3b-010813

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300088

CAS Sample ID: P1300088-008

Test Code:	ASTM D 5504-08	Date Collected:	1/8/13
Instrument ID:	Agilent 7890A/GC22/SCD	Time Collected:	17:45
Analyst:	Mike Conejo	Date Received:	1/9/13
Sample Type:	10 L Tedlar Bag	Date Analyzed:	1/9/13
Test Notes:		Time Analyzed:	12:05
		Volume(s) Analyzed:	1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C3c-010813

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300088

CAS Sample ID: P1300088-009

Test Code: ASTM D 5504-08
 Instrument ID: Agilent 7890A/GC22/SCD
 Analyst: Mike Conejo
 Sample Type: 10 L Tedlar Bag
 Test Notes:

Date Collected: 1/8/13
 Time Collected: 18:00
 Date Received: 1/9/13
 Date Analyzed: 1/9/13
 Time Analyzed: 11:50
 Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: Method Blank

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300088

CAS Sample ID: P130109-MB

Test Code: ASTM D 5504-08
 Instrument ID: Agilent 6890A/GC13/SCD
 Analyst: Mike Conejo
 Sample Type: 10 L Tedlar Bag
 Test Notes:

Date Collected: NA
 Time Collected: NA
 Date Received: NA
 Date Analyzed: 1/09/13
 Time Analyzed: 08:17
 Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: Method Blank

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300088

CAS Sample ID: P130109-MB

Test Code: ASTM D 5504-08
 Instrument ID: Agilent 7890A/GC22/SCD
 Analyst: Mike Conejo
 Sample Type: 10 L Tedlar Bag
 Test Notes:

Date Collected: NA
 Time Collected: NA
 Date Received: NA
 Date Analyzed: 1/09/13
 Time Analyzed: 08:16
 Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

LABORATORY CONTROL SAMPLE SUMMARY

Page 1 of 1

Client: CH2M Hill

Client Sample ID: Lab Control Sample

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300088

CAS Sample ID: P130109-LCS

Test Code: ASTM D 5504-08

Date Collected: NA

Instrument ID: Agilent 6890A/GC13/SCD

Date Received: NA

Analyst: Mike Conejo

Date Analyzed: 1/09/13

Sample Type: 10 L Tedlar Bag

Volume(s) Analyzed: NA ml(s)

Test Notes:

CAS #	Compound	Spike Amount ppbV	Result ppbV	% Recovery	CAS Acceptance Limits	Data Qualifier
7783-06-4	Hydrogen Sulfide	2,050	2,490	121	51-141	
463-58-1	Carbonyl Sulfide	2,020	2,530	125	63-147	
74-93-1	Methyl Mercaptan	1,890	2,270	120	54-156	

LABORATORY CONTROL SAMPLE SUMMARY

Page 1 of 1

Client: CH2M Hill

Client Sample ID: Lab Control Sample

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300088

CAS Sample ID: P130109-LCS

Test Code: ASTM D 5504-08

Date Collected: NA

Instrument ID: Agilent 7890A/GC22/SCD

Date Received: NA

Analyst: Mike Conejo

Date Analyzed: 1/09/13

Sample Type: 10 L Tedlar Bag

Volume(s) Analyzed: NA ml(s)

Test Notes:

CAS #	Compound	Spike Amount ppbV	Result ppbV	% Recovery	CAS Acceptance Limits	Data Qualifier
7783-06-4	Hydrogen Sulfide	2,050	1,920	94	51-141	
463-58-1	Carbonyl Sulfide	2,020	1,750	87	63-147	
74-93-1	Methyl Mercaptan	1,890	1,780	94	54-156	

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300088

Method Blank Summary

Test Code: ASTM D 5504-08
Instrument ID: Agilent 6890A/GC13/SCD Lab File ID: 01091304.D
Analyst: Mike Conejo Date Analyzed: 1/09/13
Sample Type: 10 L Tedlar Bag(s) Time Analyzed: 08:17
Test Notes:

Client Sample ID	CAS Sample ID	Lab File ID	Time Analyzed
Lab Control Sample	P130109-LCS	01091302.D	07:47
PZAA-C1a-010813	P1300088-001	01091311.D	11:20
PZAA-C1b-010813	P1300088-002	01091312.D	11:36
PZAA-C1c-010813	P1300088-003	01091314.D	12:11
PZAA-C2a-010813	P1300088-004	01091315.D	12:28
PZAA-C2b-010813	P1300088-005	01091318.D	13:40

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300088

Method Blank Summary

Test Code: ASTM D 5504-08
Instrument ID: Agilent 7890A/GC22/SCD Lab File ID: 01091304.d
Analyst: Mike Conejo Date Analyzed: 1/09/13
Sample Type: 10 L Tedlar Bag(s) Time Analyzed: 08:16
Test Notes:

Client Sample ID	CAS Sample ID	Lab File ID	Time Analyzed
Lab Control Sample	P130109-LCS	01091302.d	07:46
PZAA-C3c-010813	P1300088-009	01091315.d	11:50
PZAA-C3b-010813	P1300088-008	01091316.d	12:05
PZAA-C3a-010813	P1300088-007	01091317.d	12:24
PZAA-C2c-010813	P1300088-006	01091319.d	13:39

Method Path : J:\GC13\METHODS\

Method File : GC13120512.M

Title : 20 Surlfurs Initial Calibration

Last Update : Wed Dec 05 13:46:50 2012

Response Via : Initial Calibration

Calibration Files

1	=12041208.D	2	=12041209.D	3	=12041210.D
4	=12041211.D	5	=12041212.D	6	=12041213.D

	Compound	1	2	3	4	5	6	Avg	%RSD
1)	T Hydrogen_Sulfide	3.333	2.237	3.158	3.241	3.063	2.864	2.983	E4 13.39
2)	T Carbonyl_Sulfide	2.992	2.796	3.496	3.635	3.427	3.304	3.275	E4 9.77
3)	T Methyl_Mercaptan	4.293	2.792	3.554	3.571	3.340	3.142	3.449	E4 14.64
4)	T Ethyl_Mercaptan	4.293	2.792	3.554	3.571	3.340	3.142	3.449	E4 14.64
5)	T Dimethyl_Sulfide	4.293	2.792	3.554	3.571	3.340	3.142	3.449	E4 14.64
6)	T Carbon_Disulfide	8.585	5.585	7.108	7.142	6.680	6.285	6.897	E4 14.64
7)	T 2-Propyl Merc...	4.293	2.792	3.554	3.571	3.340	3.142	3.449	E4 14.64
8)	T t-Butyl_Merca...	4.293	2.792	3.554	3.571	3.340	3.142	3.449	E4 14.64
9)	T Propyl_Mercaptan	4.293	2.792	3.554	3.571	3.340	3.142	3.449	E4 14.64
10)	T Ethyl_Methyl_...	4.293	2.792	3.554	3.571	3.340	3.142	3.449	E4 14.64
11)	T Thiophene	4.293	2.792	3.554	3.571	3.340	3.142	3.449	E4 14.64
12)	T i-Butyl_Merca...	4.293	2.792	3.554	3.571	3.340	3.142	3.449	E4 14.64
13)	T Diethyl_Sulfide	4.293	2.792	3.554	3.571	3.340	3.142	3.449	E4 14.64
14)	n-Butyl_Merca...	4.293	2.792	3.554	3.571	3.340	3.142	3.449	E4 14.64
15)	Dimethyl_Disu...	8.585	5.585	7.108	7.142	6.680	6.285	6.897	E4 14.64
16)	T 2-Methyl_Thio...	4.293	2.792	3.554	3.571	3.340	3.142	3.449	E4 14.64
17)	3-Methyl_Thio...	4.293	2.792	3.554	3.571	3.340	3.142	3.449	E4 14.64
18)	T Tetrahydrothi...	4.293	2.792	3.554	3.571	3.340	3.142	3.449	E4 14.64
19)	2,5-Dimethyl_...	4.293	2.792	3.554	3.571	3.340	3.142	3.449	E4 14.64
20)	T 2-Ethyl_Thiop...	4.293	2.792	3.554	3.571	3.340	3.142	3.449	E4 14.64
21)	T Diethyl_Disul...	8.585	5.585	7.108	7.142	6.680	6.285	6.897	E4 14.64
22)	T Methyltrisulfide	1.288	0.838	1.066	1.071	1.002	0.943	1.035	E5 14.64

(#) = Out of Range

Method Path : J:\GC22\METHODS\
Method File : GC22091212.M
Title : 20 Sulfurs Initial Calibration
Last Update : Thu Sep 13 08:52:45 2012
Response Via : Initial Calibration

Calibration Files

1	=09121233.D	2	=09121234.D	3	=09121235.D
4	=09121236.D	5	=09121237.D	6	=09121239.D

	Compound	1	2	3	4	5	6	Avg	%RSD
1)	Z Hydrogen_Sulfide	5.474	3.770	4.587	4.608	3.915	5.261	4.603	E4 14.92
2)	W Carbonyl_Sulfide	5.824	5.250	5.780	5.288	4.624	6.132	5.483	E4 9.85
3)	T Methyl_Mercaptan	4.637	4.547	5.203	4.973	4.292	6.146	4.966	E4 13.32
4)	T Ethyl_Mercaptan	4.637	4.547	5.203	4.973	4.292	6.146	4.966	E4 13.32
5)	T Dimethyl_Sulfide	4.637	4.547	5.203	4.973	4.292	6.146	4.966	E4 13.32
6)	T Carbon_Disulfide	0.927	0.909	1.041	0.995	0.858	1.229	0.993	E5 13.32
7)	T 2-Propyl_Merc...	4.637	4.547	5.203	4.973	4.292	6.146	4.966	E4 13.32
8)	T t-Butyl_Merca...	4.637	4.547	5.203	4.973	4.292	6.146	4.966	E4 13.32
9)	T Propyl_Mercaptan	4.637	4.547	5.203	4.973	4.292	6.146	4.966	E4 13.32
10)	T Ethyl_Methyl_...	4.637	4.547	5.203	4.973	4.292	6.146	4.966	E4 13.32
11)	T Thiophene	4.637	4.547	5.203	4.973	4.292	6.146	4.966	E4 13.32
12)	T i-Butyl_Merca...	4.637	4.547	5.203	4.973	4.292	6.146	4.966	E4 13.32
13)	T Diethyl_Sulfide	4.637	4.547	5.203	4.973	4.292	6.146	4.966	E4 13.32
14)	T n-Butyl_Merca...	4.637	4.547	5.203	4.973	4.292	6.146	4.966	E4 13.32
15)	T Dimethyl_Disu...	0.927	0.909	1.041	0.995	0.858	1.229	0.993	E5 13.32
16)	T 2-Methylthiop...	4.637	4.547	5.203	4.973	4.292	6.146	4.966	E4 13.32
17)	T 3-Methylthiop...	4.637	4.547	5.203	4.973	4.292	6.146	4.966	E4 13.32
18)	T Tetrahydrothi...	4.637	4.547	5.203	4.973	4.292	6.146	4.966	E4 13.32
19)	T 2,5-Dimethylt...	4.637	4.547	5.203	4.973	4.292	6.146	4.966	E4 13.32
20)	T 2-Ethylthiophene	4.637	4.547	5.203	4.973	4.292	6.146	4.966	E4 13.32
21)	T Diethyl_Disul...	0.927	0.909	1.041	0.995	0.858	1.229	0.993	E5 13.32
22)	T Methyltrisulfide	1.391	1.364	1.561	1.492	1.288	1.844	1.490	E5 13.32

(#) = Out of Range

GC22091212.M Thu Sep 13 08:52:59 2012

W 4/2 b

COLUMBIA ANALYTICAL INC.**REPORT SUMMARY**

Method : 20 Surfurs Initial Calibration
 Client & Job# : CH2M Hill / P1300088
 Analyst : MC

Printed : 01/10/13
 Instrument : GC#13, SCD#13
 Date Acquired : 01/09/13

SAMPLE RESULT SUMMARIES (ppb)

Compounds	MDL	RL	ppbv	% Diff	ppbv	ppbv	ppbv	ppbv	ppbv	ppbv	ppbv	ppbv	ppbv	% Diff
Sample Information :	ppbv	std 2000ppb S27- 12141203	ics 2000ppb 11281201	% R	mb 1ml	0088-001 1ml	0088-002 1ml	0088-003 1ml	0088-004 1ml	0088-005 1ml				std 2000ppb S27- 12141203
Injection Volume (mL):	1.0	1.0	0.200		1.000	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	0.200
Dilution:					1	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1
Pi:			1.0											1.00
Pf:			1.0											1.00
PIPf DF:	1.00	1.00	1.00		1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Hydrogen_Sulfide	1.8	5.0	10737.65	6.2%	2491.3	121.8%	ND	16.86	ND	ND	ND	ND	ND	9074.35 10.2%
Carbonyl_Sulfide	5.0	5.0	11004.05	10.8%	2529.2	125.4%	ND	ND	ND	ND	ND	ND	ND	9067.35 8.7%
Methyl_Mercaptan	2.4	5.0	10153.95	5.2%	2272.4	120.4%	ND	ND	ND	ND	ND	ND	ND	8207.80 14.9%
Ethyl_Mercaptan	2.4	5.0					ND	ND	ND	ND	ND	ND	ND	ND
Dimethyl_Sulfide	2.4	5.0					Spike	ND	ND	ND	ND	ND	ND	ND
Carbon_Disulfide	2.5	2.5					Amount	ND	ND	ND	ND	ND	ND	ND
2-Propyl_Mercaptan	2.4	5.0					Hydrogen_Sulfide	2045.5	ND	ND	ND	ND	ND	ND
t-Butyl_Mercaptan(2-Me-2-	2.4	5.0					Carbonyl_Sulfide	2017.5	ND	ND	ND	ND	ND	ND
Propyl_Mercaptan	2.4	5.0					Methyl Mercaptan	1887.7	ND	ND	ND	ND	ND	ND
Ethyl_Methyl_Sulfide	2.4	5.0						ND	ND	ND	ND	ND	ND	ND
Thiophane	2.4	5.0						ND	ND	ND	ND	ND	ND	ND
i-Butyl_Mercaptan(2-Me-1-	2.4	5.0						ND	ND	ND	ND	ND	ND	ND
Diethyl_Sulfide	2.4	5.0						ND	ND	ND	ND	ND	ND	ND
m-Butyl_Mercaptan	2.4	5.0						ND	ND	ND	ND	ND	ND	ND
Dimethyl_Disulfide	1.20	2.5						ND	ND	ND	ND	ND	ND	ND
2-Methyl_Thiophene	2.4	5.0						ND	ND	ND	ND	ND	ND	ND
3-Methyl_Thiophene	2.4	5.0						ND	ND	ND	ND	ND	ND	ND
Tetrahydrothiophene	2.4	5.0						ND	ND	ND	ND	ND	ND	ND
2,5-Dimethyl_Thiophene	2.4	5.0						ND	ND	ND	ND	ND	ND	ND
2-Ethy_Thiophene	2.4	5.0						ND	ND	ND	ND	ND	ND	ND
Diethyl_Disulfide	1.20	2.5						ND	ND	ND	ND	ND	ND	ND
Methyltrisulfide	1.20	2.5						ND	ND	ND	ND	ND	ND	ND

j = estimated concentration. Concentration greater than MDL but below RL.

ALS ENVIRONMETAL INC.**REPORT SUMMARY**

Method : 20 Sulfurs Initial Calibration
 Client & Job# : CH2M Hill / P1300088
 Analyst : MC

Printed : 01/09/13
 Instrument : GC#22, SCD#22
 Date Acquired : 9 Jan 2013 8:38

SAMPLE RESULT SUMMARIES (ppb)

Compounds	MDL	RL	ppbv	% Diff	ppbv	ppbv	ppbv	ppbv	ppbv	ppbv	ppbv	ppbv	% Diff
Sample Information :	ppbv	ppbv	std 2000ppb 12141203	2000ppb 12141203	ics 2000ppb S27- 11281201	% R	mb 1ml	0088-006 1ml	0088-007 1ml	0088-008 1ml	0088-009 1ml	std 2000ppb S27- 12141203	
Injection Volume (mL):	1.0	1.0	0.200				1.000	1.0	1.0	1.0	1.0		0.200
Dilution:			1				1	1.0	1.0	1.0	1.0		1
Pf:			1.0				1.00	1.00	1.00	1.00	1.00		1.00
PfDF:			1.00				1.00	1.00	1.00	1.00	1.00		1.00
Hydrogen_Sulfide	1.8	5.0	9659.50	4.5%	1915.8	93.7%	ND	ND	ND	ND	ND	ND	8900.25 13.0%
Carbonyl_Sulfide	5.0	5.0	8788.55	11.5%	1752.9	86.9%	ND	ND	ND	ND	ND	ND	7845.30 21.0%
Methyl_Mercaptan	2.4	5.0	8936.60	7.4%	1775.8	94.1%	ND	ND	ND	ND	ND	ND	8183.25 15.2%
Ethyl_Mercaptan	2.4	5.0					ND	ND	ND	ND	ND	ND	ND
Dimethyl_Sulfide	2.4	5.0					Spike	ND	ND	ND	ND	ND	ND
Carbon_Disulfide	2.5	2.5					Amount	ND	ND	ND	ND	ND	ND
2-Propyl_Mercaptan	2.4	5.0					Hydrogen_Sulfide	2045.5	ND	ND	ND	ND	ND
t-Butyl_Mercaptan(2-Me-2-	2.4	5.0					Carbonyl_Sulfide	2017.5	ND	ND	ND	ND	ND
Propyl_Mercaptan	2.4	5.0					Methyl_Mercaptan	1887.7	ND	ND	ND	ND	ND
Ethyl_Methyl_Sulfide	2.4	5.0							ND	ND	ND	ND	ND
Thiophene	2.4	5.0							ND	ND	ND	ND	ND
t-Butyl_Mercaptan(2-Me-1-Diethyl_Sulfide	2.4	5.0							ND	ND	ND	ND	ND
n-Butyl_Mercaptan	2.4	5.0							ND	ND	ND	ND	ND
Dimethyl_Disulfide	1.20	2.5							ND	ND	ND	ND	ND
2-Methyl_Thiophene	2.4	5.0							ND	ND	ND	ND	ND
3-Methyl_Thiophene	2.4	5.0							ND	ND	ND	ND	ND
Tetrahydrothiophene	2.4	5.0							ND	ND	ND	ND	ND
2,5-Dimethyl_Thiophene	2.4	5.0							ND	ND	ND	ND	ND
2-Ethyl_Thiophene	2.4	5.0							ND	ND	ND	ND	ND
Diethyl_Disulfide	1.20	2.5							ND	ND	ND	ND	ND
MethylIrisulfide									ND	ND	ND	ND	ND

j = estimated concentration. Concentration greater than MDL but below RL.

M.L
M.M

Revised Page

LABORATORY REPORT

July 31, 2013

Karen Mordock
CH2M Hill
1717 Arch Street, Suite 4400
Philadelphia, PA 19103

RE: Pfizer Ambient Air Monitoring / 431248.AM.FW

Dear Karen:

Your report number P1300112 has been amended for the samples submitted to our laboratory on January 10, 2013. The Privileged and Confidential water mark has been removed from all of the report pages. The revised pages have been indicated by the "Revised Page" footer located at the bottom right of the page.

All analyses were performed according to our laboratory's NELAP and DoD-ELAP-approved quality assurance program. The test results meet requirements of the current NELAP and DoD-ELAP standards, where applicable, and except as noted in the laboratory case narrative provided. For a specific list of NELAP and DoD-ELAP-accredited analytes, refer to the certifications section at www.caslab.com. Results are intended to be considered in their entirety and apply only to the samples analyzed and reported herein.

Columbia Analytical Services, Inc. dba ALS Environmental (ALS) is certified by the NELAP Laboratory Certificate No. 02115CA; Arizona Department of Health Services, Certificate No. AZ0694; Florida Department of Health, NELAP Certification E871020; New Jersey Department of Environmental Protection, NELAP Laboratory Certification ID #CA009; New York State Department of Health, NELAP NY Lab ID No: 11221; Oregon Environmental Laboratory Accreditation Program, NELAP ID: CA200007; The American Industrial Hygiene Association, Laboratory #101661; United States Department of Defense Environmental Laboratory Accreditation Program (DoD-ELAP), Certificate No. L11-203; Pennsylvania Registration No. 68-03307; TX Commission of Environmental Quality, NELAP ID T104704413-12-3; Minnesota Department of Health, NELAP Certificate No. 494864; Washington State Department of Ecology, ELAP Lab ID: C946, State of Utah Department of Health, NELAP Certificate No. CA015272012-2; State of Maine Laboratory Certification Program, Certificate No. 2012039. Each of the certifications listed above have an explicit Scope of Accreditation that applies to specific matrices/methods/analytes; therefore, please contact me for information corresponding to a particular certification.

If you have any questions, please call me at (805) 526-7161.

Respectfully submitted,

ALS | Environmental



By Kelly Horiuchi at 8:44 pm, Jul 31, 2013

Kelly Horiuchi
Laboratory Director

Client: CH2M Hill
Project: Pfizer Ambient Air Monitoring / 431248.AM.FW

Service Request No: P1300112

CASE NARRATIVE

The samples were received intact under chain of custody on January 10, 2013 and were stored in accordance with the analytical method requirements. Please refer to the sample acceptance check form for additional information. The results reported herein are applicable only to the condition of the samples at the time of sample receipt.

Aldehyde Analysis

The DNPH silica gel tube samples were analyzed for aldehydes according to EPA Method TO-11A using high performance liquid chromatography (HPLC). This method is not included on the laboratory's NELAP or DoD-ELAP scope of accreditation.

Samples labeled as "PZAA-C1-010913" (-001) and "PZAA-C2-010913" (-003) were received wet. Sample labeled as "PZAA-C3-010913" (-005) was received with hardened silica cemented together indicating that it had been wet at one point and had dried.

Polynuclear Aromatic Hydrocarbon Analysis

The low volume PUF/XAD-2 samples were analyzed for polynuclear aromatic hydrocarbons (PAHs). The extracts were analyzed according to the methodology outlined in EPA Method TO-13A using combined gas chromatography/mass spectrometry (GC/MS). However, the method was modified for the use of the low volume PUF/XAD-2 sample collection materials. This method is not included on the laboratory's DoD-ELAP scope of accreditation.

The spike recovery for acenaphthylene in the Laboratory Control Sample (LCS) and Duplicate Laboratory Control Samples (LCSD) was outside the lower control criterion. The error associated with reduced recovery equates to a potential low bias. However, the spike recovery was within the Continuing Calibration Verification (CCV) criteria of 70%-130%. The percent difference for the CCV was 0.8%. The analyte(s) in question was not detected in the associated field sample(s). The associated surrogate recovery was within method specified criteria. The surrogate recovery verified extraction efficiency; hence data quality is not significantly affected. No further corrective action was taken.

NELAC requirements for compliance with EPA TO-13A state a duplicate sample must be analyzed. However, this is dependent upon the client submitting a secondary sample for extraction and analysis. Sample extraction was performed at the laboratory's off-site extraction facility located at 2360 Shasta Way, Suite G, Simi Valley, CA 93065.

The results of analyses are given in the attached laboratory report. All results are intended to be considered in their entirety, and Columbia Analytical Services, Inc. dba ALS Environmental (ALS) is not responsible for utilization of less than the complete report.

Use of Columbia Analytical Services, Inc. dba ALS Environmental (ALS)'s Name. Client shall not use ALS's name or trademark in any marketing or reporting materials, press releases or in any other manner ("Materials") whatsoever and shall not attribute to ALS any test result, tolerance or specification derived from ALS's data ("Attribution") without ALS's prior written consent, which may be withheld by ALS for any reason in its sole discretion. To request ALS's consent, Client shall provide copies of the proposed Materials or Attribution and describe in writing Client's proposed use of such Materials or Attribution. If ALS has not provided written approval of the Materials or Attribution within ten (10) days of receipt from Client, Client's request to use ALS's name or trademark in any Materials or Attribution shall be deemed denied. ALS may, in its discretion, reasonably charge Client for its time in reviewing Materials or Attribution requests. Client acknowledges and agrees that the unauthorized use of ALS's name or trademark may cause ALS to incur irreparable harm for which the recovery of money damages will be inadequate. Accordingly, Client acknowledges and agrees that a violation shall justify preliminary injunctive relief. For questions contact the laboratory.

DETAIL SUMMARY REPORT

Client: CH2M Hill Service Request: P1300112
 Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

Date Received: 1/10/2013
 Time Received: 09:45

TO-11A - Carbonyls	TO-13A Modified - PAH SIM Low Vol
--------------------	-----------------------------------

Client Sample ID	Lab Code	Matrix	Date Collected	Time Collected	
PZAA-C1-010913	P1300112-001	Air	1/9/2013	17:15	X
PZAA-C1-010913	P1300112-002	Air	1/9/2013	17:15	X
PZAA-C2-010913	P1300112-003	Air	1/9/2013	17:03	X
PZAA-C2-010913	P1300112-004	Air	1/9/2013	17:03	X
PZAA-C3-010913	P1300112-005	Air	1/9/2013	17:40	X
PZAA-C3-010913	P1300112-006	Air	1/9/2013	17:40	X



Air - Chain of Custody Record & Analytical Service Request

2655 Park Center Drive, Suite A
Simi Valley, California 93065
Phone (805) 526-7161
Fax (805) 526-7272

Page 1 of 1

Requested Turnaround Time in Business Days (Surcharges) please circle				CAS Project No.				
1 Day (100%) 2 Day (75%) 3 Day (50%) 4 Day (35%) 5 Day (25%) 10 Day Standard				<u>P13000112</u>				
Company Name & Address (Reporting Information)		Project Name		CAS Contact:				
CIAA 717 Arch Street Ste 4400 Philadelphia PA 19103		Drier Ambient Air Monitoring		K. Hartman				
Project Manager <u>Karen Nordock</u>		Project Number <u>431248-AIR-PW</u>		Analysis Method				
Phone <u>2167 1085 0198</u>		P.O. # / Billing Information		<u>10-11A (Aldhohes)</u>				
Email Address for Result Reporting <u>Karen.Nordock@chem.com</u>		Sampler (Print & Sign) <u>Leslie Bachelder</u>		Comments e.g. Actual Preservative or specific instructions				
Client Sample ID	Laboratory ID Number	Date Collected	Time Collected	Canister ID (Bar code # - AC, SC, etc.)	Flow Controller ID (Bar code # - FC #)	Canister Start Pressure "Hg	Canister End Pressure "Hg/psig	Sample Volume
P2MA-C1-010913	①	11/9/13	1715					X
P2MA-C1-010913	②		1715					X
P2MA-C2-010913	③		1703					X
P2MA-C2-010913	④		1703					X
P2MA-C3-010913	⑤		1740					X
P2MA-C3-010913	⑥		1740					X
P2MA-C3-010913	⑦		1645					X
Report Tier Levels - please select								
Tier I - Results (Default if not specified) <input checked="" type="checkbox"/> —		Tier III (Results + QC & Calibration Summaries) <input type="checkbox"/> —		Tier IV (Data Validation Package) 10% Surcharge <input type="checkbox"/> —		Pen Signature		
Tier II (Results + QC Summaries) <input type="checkbox"/> —						Type: _____		
Relinquished by: (Signature) <u>JMO</u>		Date: <u>11/13</u> Time: <u>2000</u>		Received by: (Signature) <u>John Wallace</u>		Date: _____ Time: _____		
Relinquished by: (Signature)		Date: _____ Time: _____		Received by: (Signature)		Date: _____ Time: _____		
Project Requirements (MRLs, QAPP) <u>C S 312</u>								
Cooler / Blank Temperature <u>3</u> °C COC AIR REV 3-11								

Sample Acceptance Check Form

Client: CH2M Hill

Work order: P1300112

Project: Pfizer Ambient Air Monitoring / 431248.AM.FW

Sample(s) received on: 1/10/13

Date opened: 1/10/13

by: MZAMORA

Note: This form is used for all samples received by ALS. The use of this form for custody seals is strictly meant to indicate presence/absence and not as an indication of compliance or nonconformity. Thermal preservation and pH will only be evaluated either at the request of the client and/or as required by the method/SOP.

Yes **No** **N/A**

- 1 Were **sample containers** properly marked with client sample ID?
- 2 Container(s) **supplied by ALS?**
- 3 Did **sample containers** arrive in good condition?
- 4 Were **chain-of-custody** papers used and filled out?
- 5 Did **sample container labels** and/or tags agree with custody papers?
- 6 Was **sample volume** received adequate for analysis?
- 7 Are samples within specified holding times?
- 8 Was proper **temperature** (thermal preservation) of cooler at receipt adhered to?

Cooler Temperature: 3° C Blank Temperature: ° C

Gel Packs

- 9 Was a **trip blank** received?
- 10 Were **custody seals** on outside of cooler/Box?

 Location of seal(s)? _____ Sealing Lid?

 Were signature and date included?

 Were seals intact?

 Were custody seals on outside of sample container?

 Location of seal(s)? _____ Sealing Lid?

 Were signature and date included?

 Were seals intact?

 11 Do containers have appropriate **preservation**, according to method/SOP or Client specified information?

 Is there a client indication that the submitted samples are **pH** preserved?

 Were **VOA vials** checked for presence/absence of air bubbles?

 Does the client/method/SOP require that the analyst check the sample pH and if necessary alter it?

 12 **Tubes:** Are the tubes capped and intact?

 Do they contain moisture?

 13 **Badges:** Are the badges properly capped and intact?

 Are dual bed badges separated and individually capped and intact?

Lab Sample ID	Container Description	Required pH *	Received pH	Adjusted pH	VOA Headspace (Presence/Absence)	Receipt / Preservation Comments
P1300112-001.01	Silica Gel DNPH Tube					
P1300112-002.01	PUF/XAD-2 (Low Vol)					
P1300112-003.01	Silica Gel DNPH Tube					
P1300112-004.01	PUF/XAD-2 (Low Vol)					
P1300112-005.01	Silica Gel DNPH Tube					
P1300112-006.01	PUF/XAD-2 (Low Vol)					
P1300112-007.01	Glass Microfiber Filter					

Explain any discrepancies: (include lab sample ID numbers): _____

Chain of Custody is missing sample volume(s)

PUF samples were received without ID information, and can not be assigned.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C1-010913

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300112

CAS Sample ID: P1300112-001

Test Code:	EPA Method TO-11A	Date Collected:	1/9/13
Instrument ID:	Agilent Infinity LC 1220/LC3	Date Received:	1/10/13
Analyst:	Evelyn Ibarra/Madeleine Dangazyan	Date Analyzed:	1/15/13
Sample Type:	Silica Gel DNPH Tube	Desorption Volume:	1.0 ml
Test Notes:	BC	Volume Sampled:	720 Liter(s)

CAS #	Compound	Result ng/Sample	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
50-00-0	Formaldehyde	9,500	13	0.14	11	0.11	BT, M
75-07-0	Acetaldehyde	5,000	6.9	0.14	3.8	0.077	BH
123-38-6	Propionaldehyde	< 100	ND	0.14	ND	0.058	
4170-30-3	Crotonaldehyde, Total	< 100	ND	0.14	ND	0.048	
123-72-8	Butyraldehyde	< 100	ND	0.14	ND	0.047	
100-52-7	Benzaldehyde	< 100	ND	0.14	ND	0.032	
590-86-3	Isovaleraldehyde	< 100	ND	0.14	ND	0.039	
110-62-3	Valeraldehyde	< 100	ND	0.14	ND	0.039	
529-20-4	o-Tolualdehyde	< 100	ND	0.14	ND	0.028	
620-23-5							
104-87-0	m,p-Tolualdehyde	< 200	ND	0.28	ND	0.057	
66-25-1	n-Hexaldehyde	< 100	ND	0.14	ND	0.034	
5779-94-2	2,5-Dimethylbenzaldehyde	< 100	ND	0.14	ND	0.025	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

BC = Results reported are not blank corrected.

BH = Results indicate breakthrough; back section of tube greater than front section.

BT = Results indicated possible breakthrough; back section > 10% front section.

M = Matrix interference; results may be biased high.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C2-010913

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300112

CAS Sample ID: P1300112-003

Test Code: EPA Method TO-11A
 Instrument ID: Agilent Infinity LC 1220/LC3
 Analyst: Evelyn Ibarra/Madeleine Dangazyan
 Sample Type: Silica Gel DNPH Tube
 Test Notes: BC

Date Collected: 1/9/13
 Date Received: 1/10/13
 Date Analyzed: 1/15/13
 Desorption Volume: 1.0 ml
 Volume Sampled: 722 Liter(s)

CAS #	Compound	Result ng/Sample	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
50-00-0	Formaldehyde	5,400	7.4	0.14	6.0	0.11	BT, M
75-07-0	Acetaldehyde	4,600	6.4	0.14	3.6	0.077	BT
123-38-6	Propionaldehyde	< 100	ND	0.14	ND	0.058	
4170-30-3	Crotonaldehyde, Total	< 100	ND	0.14	ND	0.048	
123-72-8	Butyraldehyde	< 100	ND	0.14	ND	0.047	
100-52-7	Benzaldehyde	< 100	ND	0.14	ND	0.032	
590-86-3	Isovaleraldehyde	< 100	ND	0.14	ND	0.039	
110-62-3	Valeraldehyde	< 100	ND	0.14	ND	0.039	
529-20-4	o-Tolualdehyde	< 100	ND	0.14	ND	0.028	
620-23-5							
104-87-0	m,p-Tolualdehyde	< 200	ND	0.28	ND	0.056	
66-25-1	n-Hexaldehyde	< 100	ND	0.14	ND	0.034	
5779-94-2	2,5-Dimethylbenzaldehyde	< 100	ND	0.14	ND	0.025	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

BC = Results reported are not blank corrected.

BT = Results indicated possible breakthrough; back section > 10% front section.

M = Matrix interference; results may be biased high.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C3-010913

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300112

CAS Sample ID: P1300112-005

Test Code:	EPA Method TO-11A	Date Collected:	1/9/13
Instrument ID:	Agilent Infinity LC 1220/LC3	Date Received:	1/10/13
Analyst:	Evelyn Ibarra/Madeleine Dangazyan	Date Analyzed:	1/15/13
Sample Type:	Silica Gel DNPH Tube	Desorption Volume:	1.0 ml
Test Notes:	BC	Volume Sampled:	1440 Liter(s)

CAS #	Compound	Result ng/Sample	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
50-00-0	Formaldehyde	4,400	3.0	0.069	2.5	0.057	BT, M
75-07-0	Acetaldehyde	2,700	1.9	0.069	1.0	0.039	BT
123-38-6	Propionaldehyde	< 100	ND	0.069	ND	0.029	
4170-30-3	Crotonaldehyde, Total	< 100	ND	0.069	ND	0.024	
123-72-8	Butyraldehyde	< 100	ND	0.069	ND	0.024	
100-52-7	Benzaldehyde	< 100	ND	0.069	ND	0.016	
590-86-3	Isovaleraldehyde	< 100	ND	0.069	ND	0.020	
110-62-3	Valeraldehyde	< 100	ND	0.069	ND	0.020	
529-20-4	o-Tolualdehyde	< 100	ND	0.069	ND	0.014	
620-23-5							
104-87-0	m,p-Tolualdehyde	< 200	ND	0.14	ND	0.028	
66-25-1	n-Hexaldehyde	< 100	ND	0.069	ND	0.017	
5779-94-2	2,5-Dimethylbenzaldehyde	< 100	ND	0.069	ND	0.013	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

BC = Results reported are not blank corrected.

BT = Results indicated possible breakthrough; back section > 10% front section.

M = Matrix interference; results may be biased high.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: Method Blank

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300112

CAS Sample ID: P130115-MB

Test Code: EPA Method TO-11A
 Instrument ID: Agilent Infinity LC 1220/LC3
 Analyst: Evelyn Ibarra/Madeleine Dangazyan
 Sample Type: Silica Gel DNPH Tube
 Test Notes: BC

Date Collected: NA
 Date Received: NA
 Date Analyzed: 01/15/13
 Desorption Volume: 1.0 ml
 Volume Sampled: NA Liter(s)

CAS #	Compound	Result ng/Sample	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
50-00-0	Formaldehyde	< 100	NA	NA	NA	NA	
75-07-0	Acetaldehyde	< 100	NA	NA	NA	NA	
123-38-6	Propionaldehyde	< 100	NA	NA	NA	NA	
4170-30-3	Crotonaldehyde, Total	< 100	NA	NA	NA	NA	
123-72-8	Butyraldehyde	< 100	NA	NA	NA	NA	
100-52-7	Benzaldehyde	< 100	NA	NA	NA	NA	
590-86-3	Isovaleraldehyde	< 100	NA	NA	NA	NA	
110-62-3	Valeraldehyde	< 100	NA	NA	NA	NA	
529-20-4	o-Tolualdehyde	< 100	NA	NA	NA	NA	
620-23-5							
104-87-0	m,p-Tolualdehyde	< 200	NA	NA	NA	NA	
66-25-1	n-Hexaldehyde	< 100	NA	NA	NA	NA	
5779-94-2	2,5-Dimethylbenzaldehyde	< 100	NA	NA	NA	NA	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

BC = Results reported are not blank corrected.

NA = Not applicable.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300112

Method Blank Summary

Test Code: EPA Method TO-11A
Instrument ID: Agilent Infinity LC 1220/LC3 Lab File ID: 0115130000003.D
Analyst: Evelyn Ibarra/Madeleine Dangazyan Date Analyzed: 01/15/13
Sample Type: (s) Time Analyzed: 15:47
Test Notes:

Client Sample ID	CAS Sample ID	Lab File ID	Time Analyzed
Method Blank (Back)	P130115-MB	0115130000004.D	15:56
Method Blank (Front)	P130115-MB	0115130000005.D	16:06
PZAA-C1-010913 (Back)	P1300112-001	0115130000010.D	16:53
PZAA-C2-010913 (Back)	P1300112-003	0115130000014.D	17:32
PZAA-C3-010913 (Back)	P1300112-005	0115130000015.D	17:41
PZAA-C1-010913 (Front)	P1300112-001	0115130000016.D	17:50
PZAA-C2-010913 (Front)	P1300112-003	0115130000018.D	18:09
PZAA-C3-010913 (Front)	P1300112-005	0115130000020.D	18:28

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C1-010913

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300112

CAS Sample ID: P1300112-002

Test Code: EPA TO-13A Modified

Date Collected: 1/9/13

Instrument ID: HP 5890II+/HP5972A/MS15

Date Received: 1/10/13

Analyst: Madeleine Dangazyan

Date Extracted: 1/16/13

Sampling Media: PUF/XAD-2 (Low Volume) Cartridge

Date Analyzed: 1/17/13

Test Notes:

Final Volume: 1.0 ml

Volume Sampled: 7200 Liter(s)

CAS #	Compound	Result µg/Cartridge	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
91-20-3	Naphthalene	< 5.0	ND	0.69	ND	0.13	
208-96-8	Acenaphthylene	< 0.50	ND	0.069	ND	0.011	L
83-32-9	Acenaphthene	< 0.50	ND	0.069	ND	0.011	
86-73-7	Fluorene	< 0.50	ND	0.069	ND	0.010	
85-01-8	Phenanthrene	< 0.50	ND	0.069	ND	0.0095	
120-12-7	Anthracene	< 0.50	ND	0.069	ND	0.0095	
206-44-0	Fluoranthene	< 0.50	ND	0.069	ND	0.0084	
129-00-0	Pyrene	< 0.50	ND	0.069	ND	0.0084	
56-55-3	Benz(a)anthracene	< 0.50	ND	0.069	ND	0.0074	
218-01-9	Chrysene	< 0.50	ND	0.069	ND	0.0074	
205-99-2	Benzo(b)fluoranthene	< 0.50	ND	0.069	ND	0.0067	
207-08-9	Benzo(k)fluoranthene	< 0.50	ND	0.069	ND	0.0067	
50-32-8	Benzo(a)pyrene	< 0.50	ND	0.069	ND	0.0067	
193-39-5	Indeno(1,2,3-cd)pyrene	< 0.50	ND	0.069	ND	0.0061	
53-70-3	Dibenz(a,h)anthracene	< 0.50	ND	0.069	ND	0.0061	
191-24-2	Benzo(g,h,i)perylene	< 0.50	ND	0.069	ND	0.0061	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

L = Laboratory control sample recovery outside the specified limits, results may be biased low.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C2-010913

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300112

CAS Sample ID: P1300112-004

Test Code: EPA TO-13A Modified

Date Collected: 1/9/13

Instrument ID: HP 5890II+/HP5972A/MS15

Date Received: 1/10/13

Analyst: Madeleine Dangazyan

Date Extracted: 1/16/13

Sampling Media: PUF/XAD-2 (Low Volume) Cartridge

Date Analyzed: 1/17/13

Test Notes:

Final Volume: 1.0 ml

Volume Sampled: 7215 Liter(s)

CAS #	Compound	Result µg/Cartridge	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
91-20-3	Naphthalene	< 5.0	ND	0.69	ND	0.13	
208-96-8	Acenaphthylene	< 0.50	ND	0.069	ND	0.011	L
83-32-9	Acenaphthene	< 0.50	ND	0.069	ND	0.011	
86-73-7	Fluorene	< 0.50	ND	0.069	ND	0.010	
85-01-8	Phenanthrene	< 0.50	ND	0.069	ND	0.0095	
120-12-7	Anthracene	< 0.50	ND	0.069	ND	0.0095	
206-44-0	Fluoranthene	< 0.50	ND	0.069	ND	0.0084	
129-00-0	Pyrene	< 0.50	ND	0.069	ND	0.0084	
56-55-3	Benz(a)anthracene	< 0.50	ND	0.069	ND	0.0074	
218-01-9	Chrysene	< 0.50	ND	0.069	ND	0.0074	
205-99-2	Benzo(b)fluoranthene	< 0.50	ND	0.069	ND	0.0067	
207-08-9	Benzo(k)fluoranthene	< 0.50	ND	0.069	ND	0.0067	
50-32-8	Benzo(a)pyrene	< 0.50	ND	0.069	ND	0.0067	
193-39-5	Indeno(1,2,3-cd)pyrene	< 0.50	ND	0.069	ND	0.0061	
53-70-3	Dibenz(a,h)anthracene	< 0.50	ND	0.069	ND	0.0061	
191-24-2	Benzo(g,h,i)perylene	< 0.50	ND	0.069	ND	0.0061	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

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RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C3-010913

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300112

CAS Sample ID: P1300112-006

Test Code: EPA TO-13A Modified

Date Collected: 1/9/13

Instrument ID: HP 5890II+/HP5972A/MS15

Date Received: 1/10/13

Analyst: Madeleine Dangazyan

Date Extracted: 1/16/13

Sampling Media: PUF/XAD-2 (Low Volume) Cartridge

Date Analyzed: 1/17/13

Test Notes:

Final Volume: 1.0 ml

Volume Sampled: 7200 Liter(s)

CAS #	Compound	Result µg/Cartridge	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
91-20-3	Naphthalene	< 5.0	ND	0.69	ND	0.13	
208-96-8	Acenaphthylene	< 0.50	ND	0.069	ND	0.011	L
83-32-9	Acenaphthene	< 0.50	ND	0.069	ND	0.011	
86-73-7	Fluorene	< 0.50	ND	0.069	ND	0.010	
85-01-8	Phenanthrene	< 0.50	ND	0.069	ND	0.0095	
120-12-7	Anthracene	< 0.50	ND	0.069	ND	0.0095	
206-44-0	Fluoranthene	< 0.50	ND	0.069	ND	0.0084	
129-00-0	Pyrene	< 0.50	ND	0.069	ND	0.0084	
56-55-3	Benz(a)anthracene	< 0.50	ND	0.069	ND	0.0074	
218-01-9	Chrysene	< 0.50	ND	0.069	ND	0.0074	
205-99-2	Benzo(b)fluoranthene	< 0.50	ND	0.069	ND	0.0067	
207-08-9	Benzo(k)fluoranthene	< 0.50	ND	0.069	ND	0.0067	
50-32-8	Benzo(a)pyrene	< 0.50	ND	0.069	ND	0.0067	
193-39-5	Indeno(1,2,3-cd)pyrene	< 0.50	ND	0.069	ND	0.0061	
53-70-3	Dibenz(a,h)anthracene	< 0.50	ND	0.069	ND	0.0061	
191-24-2	Benzo(g,h,i)perylene	< 0.50	ND	0.069	ND	0.0061	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

L = Laboratory control sample recovery outside the specified limits, results may be biased low.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: Method Blank

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300112

CAS Sample ID: P130116-MB

Test Code: EPA TO-13A Modified

Date Collected: NA

Instrument ID: HP 5890II+/HP5972A/MS15

Date Received: NA

Analyst: Madeleine Dangazyan

Date Extracted: 1/16/13

Sampling Media: PUF/XAD-2 (Low Volume) Cartridge

Date Analyzed: 1/17/13

Test Notes:

Final Volume: 1.0 ml

Volume Sampled: NA Liter(s)

CAS #	Compound	Result µg/Cartridge	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
91-20-3	Naphthalene	< 5.0	NA	NA	NA	NA	
208-96-8	Acenaphthylene	< 0.50	NA	NA	NA	NA	L
83-32-9	Acenaphthene	< 0.50	NA	NA	NA	NA	
86-73-7	Fluorene	< 0.50	NA	NA	NA	NA	
85-01-8	Phenanthrene	< 0.50	NA	NA	NA	NA	
120-12-7	Anthracene	< 0.50	NA	NA	NA	NA	
206-44-0	Fluoranthene	< 0.50	NA	NA	NA	NA	
129-00-0	Pyrene	< 0.50	NA	NA	NA	NA	
56-55-3	Benz(a)anthracene	< 0.50	NA	NA	NA	NA	
218-01-9	Chrysene	< 0.50	NA	NA	NA	NA	
205-99-2	Benzo(b)fluoranthene	< 0.50	NA	NA	NA	NA	
207-08-9	Benzo(k)fluoranthene	< 0.50	NA	NA	NA	NA	
50-32-8	Benzo(a)pyrene	< 0.50	NA	NA	NA	NA	
193-39-5	Indeno(1,2,3-cd)pyrene	< 0.50	NA	NA	NA	NA	
53-70-3	Dibenz(a,h)anthracene	< 0.50	NA	NA	NA	NA	
191-24-2	Benzo(g,h,i)perylene	< 0.50	NA	NA	NA	NA	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

L = Laboratory control sample recovery outside the specified limits, results may be biased low.

NA = Not applicable.

SURROGATE SPIKE RECOVERY RESULTS

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Client: CH2M Hill

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300112

Test Code:	EPA TO-13A Modified	Date(s) Collected:	1/9/13
Instrument ID:	HP 5890II+/HP5972A/MS15	Date(s) Received:	1/10/13
Analyst:	Madeleine Dangazyan	Date(s) Extracted:	1/16/13
Sampling Media:	PUF/XAD-2 (Low Volume) Cartridge(s)	Date(s) Analyzed:	1/17/13
Test Notes:			

Client Sample ID	CAS Sample ID	Fluorene-d10		Pyrene-d10		Data Qualifier
		% Recovered	Acceptance Limits	% Recovered	Acceptance Limits	
Method Blank	P130116-MB	92	60-120	92	60-120	
Lab Control Sample	P130116-LCS	83	60-120	89	60-120	
Duplicate Lab Control Sample	P130116-DLCS	89	60-120	90	60-120	
PZAA-C1-010913	P1300112-002	91	60-120	93	60-120	
PZAA-C2-010913	P1300112-004	90	60-120	91	60-120	
PZAA-C3-010913	P1300112-006	90	60-120	89	60-120	

LABORATORY CONTROL SAMPLE / DUPLICATE LABORATORY CONTROL SAMPLE SUMMARY

Page 1 of 1

Client: CH2M Hill

Client Sample ID: Duplicate Lab Control Sample

CAS Project ID: P1300112

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P130116-DLCS

Test Code: EPA TO-13A Modified

Date Collected: NA

Instrument ID: HP 5890II+/HP5972A/MS15

Date Received: NA

Analyst: Madeleine Dangazyan

Date Extracted: 1/16/13

Sampling Media: PUF/XAD-2 (Low Volume) Cartridge

Date Analyzed: 1/17/13

Test Notes:

Volume(s) Analyzed: NA Liter(s)

CAS #	Compound	Spike Amount		Result		CAS		RPD	RPD	Data Limit	Data Qualifier
		LCS / DLCS µg/ml	LCS µg/ml	DLCS µg/ml	% Recovery LCS	% Recovery DLCS	Acceptance Limits				
91-20-3	Naphthalene	5.00	3.67	3.19	73	64	60-120	13	18		
208-96-8	Acenaphthylene	5.00	2.47	2.58	49	52	60-120	6	18		L
83-32-9	Acenaphthene	5.00	3.79	3.33	76	67	60-120	13	19		
86-73-7	Fluorene	5.00	3.68	3.93	74	79	60-120	7	20		
85-01-8	Phenanthrene	5.00	3.90	3.63	78	73	60-120	7	20		
120-12-7	Anthracene	5.00	3.31	3.23	66	65	60-120	2	19		
206-44-0	Fluoranthene	5.00	4.09	3.90	82	78	60-120	5	21		
129-00-0	Pyrene	5.00	3.90	3.97	78	79	60-120	1	21		
56-55-3	Benz(a)anthracene	5.00	3.98	3.97	80	79	60-120	1	17		
218-01-9	Chrysene	5.00	4.78	4.64	96	93	60-120	3	17		
205-99-2	Benzo(b)fluoranthene	5.00	5.85	5.53	117	111	60-120	5	18		
207-08-9	Benzo(k)fluoranthene	5.00	5.51	5.32	110	106	60-120	4	19		
50-32-8	Benzo(a)pyrene	5.00	4.43	4.53	89	91	60-120	2	19		
193-39-5	Indeno(1,2,3-cd)pyrene	5.00	5.35	4.86	107	97	60-120	10	19		
53-70-3	Dibenz(a,h)anthracene	5.00	5.52	5.33	110	107	60-120	3	20		
191-24-2	Benzo(g,h,i)perylene	5.00	5.30	5.13	106	103	60-120	3	22		

L = Laboratory control sample recovery outside the specified limits, results may be biased low.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300112

Method Blank Summary

Test Code: EPA TO-13A Modified
Instrument ID: HP 5890II+/HP5972A/MS15 Lab File ID: 01171307.D
Analyst: Madeleine Dangazyan Date Analyzed: 1/17/13
Sampling Media: (s) Time Analyzed: 17:00
Test Notes:

Client Sample ID	CAS Sample ID	Lab File ID	Time Analyzed
Lab Control Sample	P130116-LCS	01171305.D	16:04
Duplicate Lab Control Sample	P130116-DLCS	01171306.D	16:32
PZAA-C1-010913	P1300112-002	01171308.D	17:29
PZAA-C2-010913	P1300112-004	01171309.D	17:57
PZAA-C3-010913	P1300112-006	01171310.D	18:25

Method Path : J:\LC03\METHODS\

Method File : TO11A101512E.M

Title : TO-11A Method for Aldehydes/Ketones by HPLC

Last Update : Fri Oct 19 11:48:51 2012

Response Via : Initial Calibration

Calibration Files

50	=101512000009.D	100	=1015120000012.D	500	=1015120000015.D
1500	=1015120000018.D	5000	=1015120000021.D	10	=1015120000024.D

	Compound	50	100	500	1500	5000	10	Avg	%RSD
1)	Formaldehyde	2.155	2.158	2.199	2.218	2.203	2.156	2.182 E4	1.31
2)	Acetaldehyde	1.649	1.625	1.640	1.647	1.635	1.601	1.633 E4	1.09
3)	Acetone	1.183	1.196	1.190	1.197	1.189	1.166	1.187 E4	0.97
4)	Acrolein	1.445	1.447	1.450	1.461	1.453	1.422	1.446 E4	0.90
5)	Propionaldehyde	1.246	1.247	1.252	1.260	1.253	1.227	1.248 E4	0.89
6)	Crotonaldehyde	1.067	1.060	1.057	1.067	1.062	1.040	1.059 E4	0.95
7)	Butyraldehyde	1.030	1.016	1.006	1.021	1.017	0.998	1.015 E4	1.10
8)	Benzaldehyde	6.979	6.993	7.109	7.185	7.159	7.029	7.076 E3	1.24
9)	Isovaleraldehyde	8.878	8.499	8.679	8.720	8.669	8.513	8.660 E3	1.63
10)	Valeraldehyde	8.652	8.474	8.593	8.646	8.612	8.457	8.572 E3	1.00
11)	o-Tolualdehyde	4.322	4.298	4.697	4.918	5.144	5.203	4.764 E3	8.28
12)	m,p-Tolualdehyde	6.216	6.383	6.616	6.681	6.573	6.382	6.475 E3	2.73
13)	Hexaldehyde	7.354	7.269	7.364	7.436	7.429	7.298	7.358 E3	0.92
14)	2,5-Dimethylb...	4.359	4.988	5.204	5.376	5.450	5.371	5.125 E3	8.00

(#= Out of Range

TO11A101512E.M Fri Oct 19 11:48:56 2012

ALS Environmental

TO11A Aldehyde & Ketone DNP/H Analysis by HPLC
 Instrument : LC 03 Printed : 1/21/2013
 Detector : UV-VIS 360 Date Acquired : 1/15/2013
 Analyst : MDIEI Sample Amount : 2.5uL
 Client & Job# : CH2M Hill P1300112

QC

Sample Information		MRL	TO-11A 1500ng/ml S26-10041208	% Diff	ACN Blank lot DE483	MB Back lot77767872 1.0ml	MB Front lot77767872 1.0ml	TO-11A 1500ng/ml S26-10041208	% Diff	TO-11A 1500ng/ml S26-10041208	% Diff	
Dilution	1.0	NA			1.0	1.0	1.0					
Sample Volume (L)	1.0					NA	NA					
Final Vol.(mL)	1.0					1.0	1.0					
Data File	0115130000 002.D					011513000000 3.D	011513000000 4.D	011513000000 5.D			0115130000 013.D	0115130000 022.D
	ng/sample					ng/sample	ng/sample	ng/sample			ng/sample	ng/sample
Formaldehyde	100.00	1597.4	6.5%	ND	ND	ND	ND	1597.9	6.5%	1593.9	6.3%	
Acetaldehyde	100.00	1606.2	7.1%	ND	ND	ND	ND	1602.6	6.8%	1605.5	7.0%	
Propionaldehyde	100.00	1608.6	7.2%	ND	ND	ND	ND	1610.0	7.3%	1595.1	6.3%	
Crotonaldehyde	100.00	1602.4	6.8%	ND	ND	ND	ND	1606.1	7.1%	1603.3	6.9%	
Butyraldehyde	100.00	1596.9	6.5%	ND	ND	ND	ND	1594.9	6.3%	1596.7	6.4%	
Benzaldehyde	100.00	1611.8	7.5%	ND	ND	ND	ND	1619.5	8.0%	1613.7	7.6%	
Isovaleraldehyde	100.00	1607.3	7.2%	ND	ND	ND	ND	1612.9	7.5%	1597.3	6.5%	
Valeraldehyde	100.00	1604.7	7.0%	ND	ND	ND	ND	1610.2	7.3%	1594.8	6.3%	
o-Tolualdehyde	100.00	1597.2	6.5%	ND	ND	ND	ND	1680.2	12.0%	1702.3	13.5%	
m,p-Tolualdehyde	200.00	3292.0	9.7%	ND	ND	ND	ND	3292.4	9.7%	3235.4	7.8%	
Hexaldehyde	100.00	1597.1	6.5%	ND	ND	ND	ND	1607.3	7.2%	1605.3	7.0%	
2,5-Dimethylbenzaldehyde	100.00	1592.9	6.2%	ND	ND	ND	ND	1622.1	8.1%	1667.4	11.2%	

Revised Page

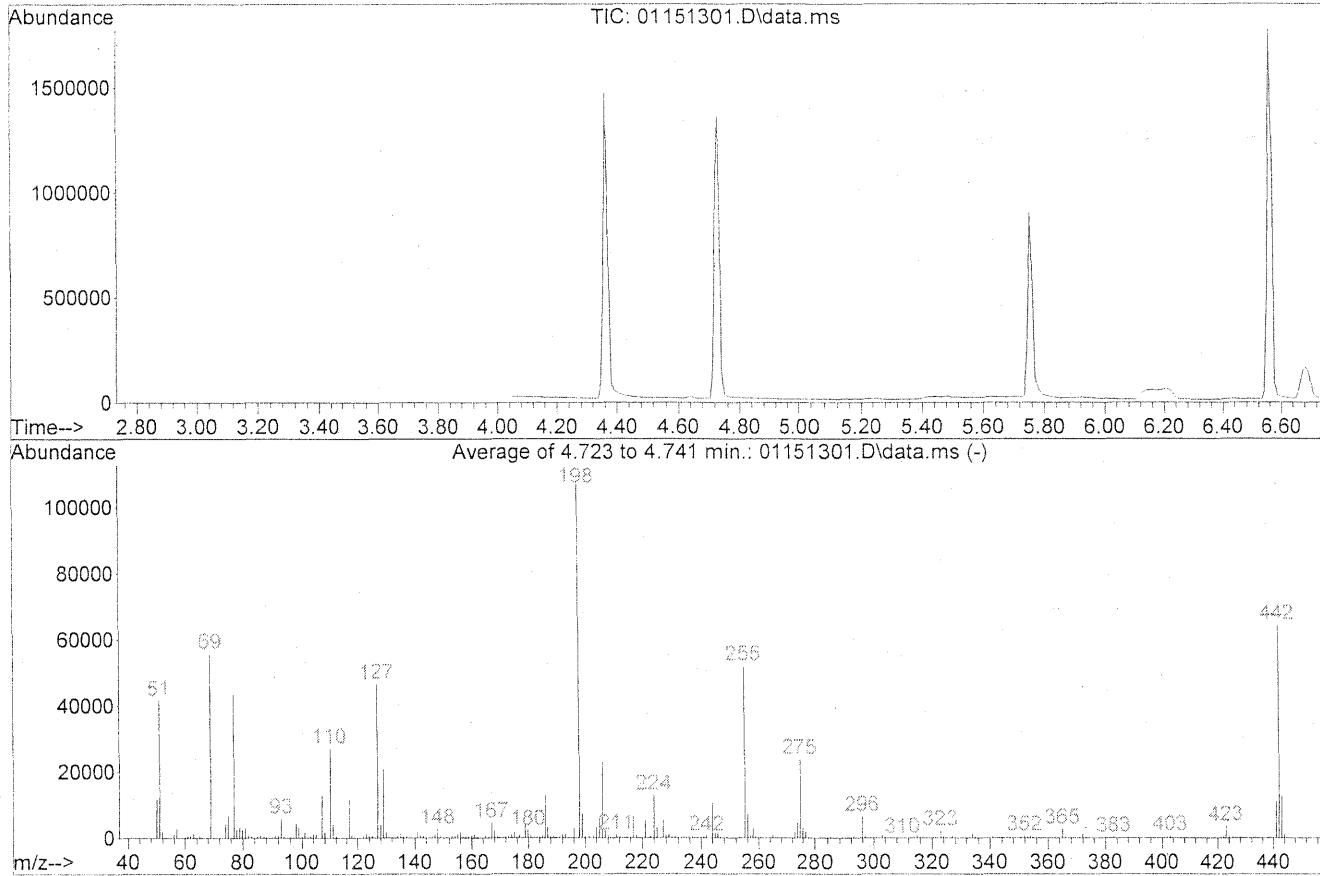
DFTPP

Data Path : J:\MS15\DATA\TO13\2013_01\15\
 Data File : 01151301.D
 Acq On : 15 Jan 2013 10:33 am
 Operator : MD
 Sample : DFTPP tune check
 Misc :
 ALS Vial : 1 Sample Multiplier: 1

Integration File: events.e

Method : J:\MS15\METHODS\PS011513E.M
 Title : TO-13A Modified For PAHs in SIM
 Last Update : Wed Jan 16 09:21:33 2013

(M)
1/16/13



AutoFind: Scans 77, 78, 79; Background Corrected with Scan 72

Target Mass	Rel. to 198	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
51	198	30	60	38.5	41556	PASS
68	69	0.00	2	0.0	0	PASS
69	198	0.00	100	51.9	55914	PASS
70	69	0.00	2	0.1	45	PASS
127	198	40	60	43.2	46586	PASS
197	198	0.00	1	0.0	0	PASS
198	198	100	100	100.0	107806	PASS
199	198	5	9	6.8	7277	PASS
275	198	10	30	22.1	23863	PASS
365	198	1	100	2.6	2777	PASS
441	443	0.01	100	85.9	11016	PASS
442	198	40	100	59.8	64451	PASS
443	442	17	23	19.9	12818	PASS

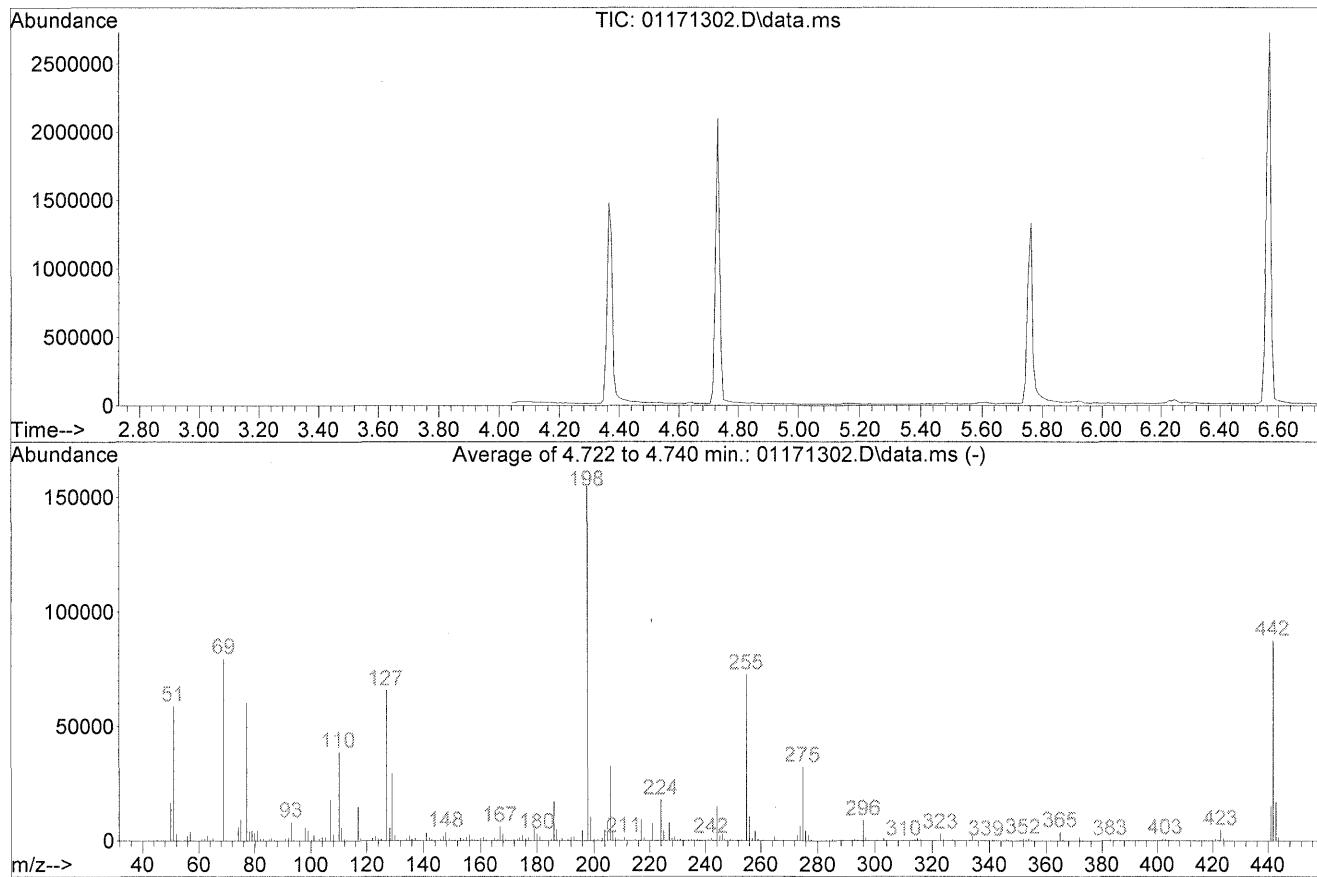
DFTPP

Data Path : J:\MS15\DATA\TO13\2013_01\17\
 Data File : 01171302.D
 Acq On : 17 Jan 2013 2:35 pm
 Operator : MD
 Sample : DFTPP tune check
 Misc :
 ALS Vial : 1 Sample Multiplier: 1

Integration File: events.e

Method : J:\MS15\METHODS\PS011513E.M
 Title : TO-13A Modified For PAHs in SIM
 Last Update : Thu Jan 17 15:26:59 2013

MD
1/18/13



AutoFind: Scans 77, 78, 79; Background Corrected with Scan 73

| Target Mass	| Rel. to Mass	| Lower Limit%	| Upper Limit%	| Rel. Abn%	| Raw Abn	| Result Pass/Fail
| 51	| 198	| 30	| 60	| 37.8	| 58889	| PASS
| 68	| 69	| 0.00	| 2	| 0.0	| 0	| PASS
| 69	| 198	| 0.00	| 100	| 51.2	| 79622	| PASS
| 70	| 69	| 0.00	| 2	| 0.4	| 321	| PASS
| 127	| 198	| 40	| 60	| 42.2	| 65731	| PASS
| 197	| 198	| 0.00	| 1	| 0.0	| 0	| PASS
| 198	| 198	| 100	| 100	| 100.0	| 155629	| PASS
| 199	| 198	| 5	| 9	| 6.7	| 10368	| PASS
| 275	| 198	| 10	| 30	| 20.8	| 32354	| PASS
| 365	| 198	| 1	| 100	| 2.5	| 3884	| PASS
| 441	| 443	| 0.01	| 100	| 90.5	| 15267	| PASS
| 442	| 198	| 40	| 100	| 56.3	| 87578	| PASS
| 443	| 442	| 17	| 23	| 19.3	| 16876	| PASS

Response Factor Report MS15

Method Path : J:\MS15\METHODS\
 Method File : PS011513E.M
 Title : TO-13A Modified For PAHs in SIM
 Last Update : Wed Jan 16 09:21:33 2013
 Response Via : Initial Calibration

Calibration Files

0.5 =01151311.D 1 =01151312.D 5 =01151313.D 10 =01151314.D
 20 =01151315.D 40 =01151316.D

	Compound	0.5	1	5	10	20	40	Avg	%RSD
<hr/>									
1)	I Naphthalene-d8	-----ISTD-----							
2)	Naphthalene	1.115	1.100	1.065	1.001	0.954	1.062	1.050	5.84
3)	I Acenaphthene-d10	-----ISTD-----							
4)	Acenaphthylene	2.108	2.023	1.862	1.758	1.655	1.923	1.888	8.85
5)	Acenaphthene	1.424	1.241	1.131	0.985	0.928	1.121	1.138	15.71
6)	S Fluorene-d10	1.337	1.204	1.054	0.971	0.930	1.073	1.095	13.85
7)	Fluorene	1.330	1.268	1.152	1.139	1.269	1.196	1.226	6.15
8)	I Phenanthrene-d10	-----ISTD-----							
9)	Phenanthrene	1.205	1.186	1.181	0.937	0.897	1.054	1.077	12.57
10)	Anthracene	1.205	1.194	1.241	1.059	1.033	1.126	1.143	7.36
11)	S Fluoranthene-d10	1.217	1.243	1.183	1.075	1.015	1.151	1.147	7.61
12)	Fluoranthene	1.279	1.291	1.263	1.185	1.094	1.224	1.223	6.08
13)	S Pyrene-d10	1.034	1.011	1.000	0.954	0.872	0.983	0.976	5.89
14)	Pyrene	1.398	1.350	1.287	1.222	1.163	1.284	1.284	6.61
15)	I Chrysene-d12	-----ISTD-----							
16)	Benzo[a]anthra...	1.294	1.481	1.329	1.135	1.069	1.322	1.272	11.67
17)	Chrysene	1.087	1.349	1.259	1.057	1.053	1.284	1.182	11.06
18)	I Perylene-d12	-----ISTD-----							
19)	Benzo[b]fluora...	1.107	1.043	1.103	1.032	0.971	1.139	1.066	5.79
20)	Benzo[k]fluora...	1.199	1.197	1.185	1.097	1.059	1.247	1.164	6.09
21)	S Benzo[a]pyrene...	0.771	0.743	0.797	0.773	0.708	0.863	0.776	6.78
22)	Benzo[a]pyrene	0.981	0.950	0.983	0.946	0.910	1.133	0.984	7.92
23)	Indeno[1,2,3-c...	0.951	0.972	0.966	0.947	0.945	1.156	0.989	8.31
24)	Dibenz[a,h]ant...	0.919	0.952	0.961	0.951	0.937	1.099	0.970	6.70
25)	Benzo[g,h,i]pe...	1.057	1.058	1.059	1.030	0.993	1.183	1.063	6.02

(#) = Out of Range

ALS Environmental**TO-13A Polynuclear Aromatic Hydrocarbons (PAHs) by GC/MS**

Method : TO-13A Modified For PAHs in SIM
 Client & Job# : CH2M Hill P1300112
 Analyst : MD

Printed : 1/18/2013
 Instrument : MS15
 Date Acquired : 1/17/2013
 Sample Media: LowVol Puf

SAMPLE RESULT SUMMARIES (ug/ml)

	<u>MDL</u>	<u>%Diff.</u>	<u>ug/ml</u>	<u>ug/ml</u>	<u>LCSD 5ug/ml ext.1/16/13 fv=1mL</u>	<u>% Rec.</u>	<u>% Rec.</u>	<u>% RPD</u>	<u>% RPD</u>	<u>ug/sample</u>	<u>ug/sample</u>	<u>ug/sample</u>	<u>ug/sample</u>
Sample Information :	ug/ml		5ug/ml PAHs CCV S26-07181209	LCS 5ug/ml ext.1/16/13 fv=1mL	LCSD 5ug/ml ext.1/16/13 fv=1mL					ext.1/16/13 fv=1mL	P130112-002 ext.1/16/13 fv=1mL	P130112-004 ext.1/16/13 fv=1mL	P130112-006 ext.1/16/13 fv=1mL
Dilution Factor	1.0	CCV Concentration	1.0	1.0	1.0					ext.1/16/13 fv=1mL	MB	P130112-004 ext.1/16/13 fv=1mL	P130112-006 ext.1/16/13 fv=1mL
Final Extract Vol. (ml)	1.0	5 ug/ml	1.0	1.0	1.0					ext.1/16/13 fv=1mL	MB	P130112-002 ext.1/16/13 fv=1mL	P130112-004 ext.1/16/13 fv=1mL
Naphthalene	5.00	5.11	2.3%	3.67	73%	3.19	64%	14%	14%	ND	ND	ND	ND
Acenaphthylene	0.50	4.96	0.8%	2.47	49%	2.58	52%	4%	4%	ND	ND	ND	ND
Acenaphthene	0.50	4.82	3.5%	3.79	76%	3.33	67%	13%	13%	ND	ND	ND	ND
Fluorene	0.50	5.03	0.6%	3.68	74%	3.93	79%	6%	6%	ND	ND	ND	ND
Phenanthrene	0.50	4.74	5.3%	3.90	78%	3.63	73%	7%	7%	ND	ND	ND	ND
Anthracene	0.50	4.88	2.4%	3.31	66%	3.23	65%	2%	2%	ND	ND	ND	ND
Fluoranthene	0.50	4.77	4.6%	4.09	82%	3.90	78%	5%	5%	ND	ND	ND	ND
Pyrene	0.50	4.83	3.4%	3.90	78%	3.97	79%	2%	2%	ND	ND	ND	ND
Benzo(a)anthracene	0.50	4.77	4.7%	3.98	80%	3.97	79%	0%	0%	ND	ND	ND	ND
Chrysene	0.50	5.19	3.8%	4.78	96%	4.64	93%	3%	3%	ND	ND	ND	ND
Benzo[b]fluoranthene	0.50	4.97	0.6%	5.85	117%	5.53	111%	6%	6%	ND	ND	ND	ND
Benzo[k]fluoranthene	0.50	4.92	1.6%	5.51	110%	5.32	106%	4%	4%	ND	ND	ND	ND
Benzo[a]pyrene	0.50	5.01	0.2%	4.43	89%	4.53	91%	2%	2%	ND	ND	ND	ND
Indeno[1,2,3-cd]pyrene	0.50	4.80	4.1%	5.35	107%	4.86	97%	10%	10%	ND	ND	ND	ND
Dibenz[a,h]anthracene	0.50	5.15	3.1%	5.52	110%	5.33	107%	4%	4%	ND	ND	ND	ND
Benzo[g,h,i]perylene	0.50	5.05	1.0%	5.30	106%	5.13	103%	3%	3%	ND	ND	ND	ND

% Surrogate Recoveries Summary

Sample Information :	LCS 5ug/ml ext.1/16/13 fv=1mL	LCSD 5ug/ml ext.1/16/13 fv=1mL	MB ext.1/16/13 fv=1mL	P130112-002 ext.1/16/13 fv=1mL	P130112-004 ext.1/16/13 fv=1mL	P130112-006 ext.1/16/13 fv=1mL
Fluorene-d10	ug/ml	4.13	4.45	4.59	4.55	4.51
Fluorene-d10	% Recovery	83%	89%	92%	91%	90%
Pyrene-d10	ug/ml	4.47	4.51	4.61	4.63	4.57
Pyrene-d10	% Recovery	89%	90%	92%	93%	91%
Fluorene-d10	Pass	Pass	Pass	Pass	Pass	Pass
Pyrene-d10	Pass	Pass	Pass	Pass	Pass	Pass

LABORATORY REPORT

July 31, 2013

Karen Mordock
CH2M Hill
1717 Arch Street, Suite 4400
Philadelphia, PA 19103

RE: Pfizer Ambient Air Monitoring / 431248.AM.FW

Dear Karen:

Your report number P1300114 has been amended for the samples submitted to our laboratory on January 10, 2013. The Privileged and Confidential water mark has been removed from all of the report pages. The revised pages have been indicated by the "Revised Page" footer located at the bottom right of the page.

All analyses were performed according to our laboratory's NELAP and DoD-ELAP-approved quality assurance program. The test results meet requirements of the current NELAP and DoD-ELAP standards, where applicable, and except as noted in the laboratory case narrative provided. For a specific list of NELAP and DoD-ELAP-accredited analytes, refer to the certifications section at www.caslab.com. Results are intended to be considered in their entirety and apply only to the samples analyzed and reported herein.

Columbia Analytical Services, Inc. dba ALS Environmental (ALS) is certified by the NELAP Laboratory Certificate No. 02115CA; Arizona Department of Health Services, Certificate No. AZ0694; Florida Department of Health, NELAP Certification E871020; New Jersey Department of Environmental Protection, NELAP Laboratory Certification ID #CA009; New York State Department of Health, NELAP NY Lab ID No: 11221; Oregon Environmental Laboratory Accreditation Program, NELAP ID: CA200007; The American Industrial Hygiene Association, Laboratory #101661; United States Department of Defense Environmental Laboratory Accreditation Program (DoD-ELAP), Certificate No. L11-203; Pennsylvania Registration No. 68-03307; TX Commission of Environmental Quality, NELAP ID T104704413-12-3; Minnesota Department of Health, NELAP Certificate No. 494864; Washington State Department of Ecology, ELAP Lab ID: C946, State of Utah Department of Health, NELAP Certificate No. CA015272012-2; State of Maine Laboratory Certification Program, Certificate No. 2012039. Each of the certifications listed above have an explicit Scope of Accreditation that applies to specific matrices/methods/analytes; therefore, please contact me for information corresponding to a particular certification.

If you have any questions, please call me at (805) 526-7161.

Respectfully submitted,

ALS | Environmental



By Kelly Horiuchi at 8:36 pm, Jul 31, 2013

Kelly Horiuchi
Laboratory Director

Client: CH2M Hill Service Request No: P1300114
Project: Pfizer Ambient Air Monitoring / 431248.AM.FW

CASE NARRATIVE

The samples were received intact under chain of custody on January 10, 2013 and were stored in accordance with the analytical method requirements. Please refer to the sample acceptance check form for additional information. The results reported herein are applicable only to the condition of the samples at the time of sample receipt.

Volatile Organic Compound Analysis

The samples were analyzed for volatile organic compounds in accordance with EPA Method TO-15 from the Compendium of Methods for the Determination of Toxic Organic Compounds in Ambient Air, Second Edition (EPA/625/R-96/010b), January, 1999. The analytical system was comprised of a gas chromatograph / mass spectrometer (GC/MS) interfaced to a whole-air preconcentrator. Any analytes flagged with an X are not included on the laboratory's NELAP or DoD-ELAP scope of accreditation.

The results of analyses are given in the attached laboratory report. All results are intended to be considered in their entirety, and Columbia Analytical Services, Inc. dba ALS Environmental (ALS) is not responsible for utilization of less than the complete report.

Use of Columbia Analytical Services, Inc. dba ALS Environmental (ALS)'s Name. Client shall not use ALS's name or trademark in any marketing or reporting materials, press releases or in any other manner ("Materials") whatsoever and shall not attribute to ALS any test result, tolerance or specification derived from ALS's data ("Attribution") without ALS's prior written consent, which may be withheld by ALS for any reason in its sole discretion. To request ALS's consent, Client shall provide copies of the proposed Materials or Attribution and describe in writing Client's proposed use of such Materials or Attribution. If ALS has not provided written approval of the Materials or Attribution within ten (10) days of receipt from Client, Client's request to use ALS's name or trademark in any Materials or Attribution shall be deemed denied. ALS may, in its discretion, reasonably charge Client for its time in reviewing Materials or Attribution requests. Client acknowledges and agrees that the unauthorized use of ALS's name or trademark may cause ALS to incur irreparable harm for which the recovery of money damages will be inadequate. Accordingly, Client acknowledges and agrees that a violation shall justify preliminary injunctive relief. For questions contact the laboratory.

DETAIL SUMMARY REPORT

Client: CH2M Hill Service Request: P1300114
Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

Date Received: 1/10/2013
Time Received: 09:45

TO-15 - VOC Cans

Client Sample ID	Lab Code	Matrix	Date Collected	Time Collected	Container ID	Pi1 (psig)	Pf1 (psig)	TO-15 - VOC Cans
PZAA-P1-010913	P1300114-001	Air	1/9/2013	15:35	AC01632	-2.36	3.51	X
PZAA-P2-010913	P1300114-002	Air	1/9/2013	10:35	AC01101	-2.12	3.53	X
PZAA-P3-010913	P1300114-003	Air	1/9/2013	11:45	AC01039	-2.15	3.54	X
PZAA-P4-010913	P1300114-004	Air	1/9/2013	15:00	AC01769	-0.95	3.52	X
PZAA-P5-010913	P1300114-005	Air	1/9/2013	15:20	AC01407	-1.52	3.54	X
PZAA-P6-010913	P1300114-006	Air	1/9/2013	13:50	AC01948	-1.36	3.52	X
PZAA-P7-010913	P1300114-007	Air	1/9/2013	10:00	AC01453	-0.85	3.53	X
PZAA-P8-010913	P1300114-008	Air	1/9/2013	09:45	AC01868	-3.21	3.61	X
PZAA-C1-010913	P1300114-009	Air	1/9/2013	15:10	AC00843	-1.62	3.61	X
PZAA-C2-010913	P1300114-010	Air	1/9/2013	16:05	AC01028	-1.93	3.56	X
PZAA-C3-010913	P1300114-011	Air	1/9/2013	14:05	AC00998	-1.08	3.52	X
PZAA-C3-010913-D	P1300114-012	Air	1/9/2013	16:00	AC01908	-1.73	3.53	X
PZAA-C4-010913	P1300114-013	Air	1/9/2013	16:10	AC01131	-2.53	3.59	X
PZAA-W1-010913	P1300114-014	Air	1/9/2013	13:36	AC01188	-1.82	3.54	X
PZAA-S1-010913	P1300114-015	Air	1/9/2013	10:50	AC00894	-1.02	3.54	X
PZAA-N1-010913	P1300114-017	Air	1/9/2013	10:45	AC00789	-1.55	3.62	X

Air - Chain of Custody Record & Analytical Service Request

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Company Name & Address (Reporting Information)							Requested Turnaround Time in Business Days (Surcharges) please circle			CAS Project No.			
City/Hill 717 Arch Street Ste 4400 Philadelphia PA 19103 Project Manager Karen Morlock Phone 267.485.0108 Email Address or Result Reporting <u>Karen.Morlock@chem.com</u>							1 Day (100%) <input type="checkbox"/> 2 Day (75%) <input type="checkbox"/> 3 Day (50%) <input type="checkbox"/> 4 Day (35%) <input type="checkbox"/> 5 Day (25%) <input type="checkbox"/> 10 Day Standard <input checked="" type="checkbox"/>			CAS Project Contact: <u>K. Horieuchi</u>			
							Analysis Method			Comments e.g. Actual Preservative or specific instructions			
Client Sample ID	Laboratory ID Number	Date Collected	Time Collected	Canister ID (Bar code # - AC, SC, etc.)	Flow Controller ID (Bar code # - FC #)	Canister Start Pressure "Hg	Canister End Pressure "Hg psig	Sample Volume					
PZAA-P1-010913	①-1-42	11/9/13	15:35	AC011032*	FCAC0242	-30.54	-4.58	6L	X	Beginning			
PZAA-P2-010913	②-2-11		10:35	AC01101*	FCAC0095	-29.90	-6.54	1L	X	End			
PZAA-P3-010913	③-2-17		11:45	AC01039*	FCAC0293	-30.28	-6.31		X	Pressures			
PZAA-P4-010913	④-0-75		15:00	AC0117109*	FCAC00059	-20.39	-3.83		X	done with			
PZAA-P5-010913	⑤-1-14		15:20	AC01407*	FCAC00177	-30.44	-4.98		X	Digital			
PZAA-P6-010913	⑥-1-34		13:50	AC01048*	FCAC02434	-30.36	-4.54		X	Pressure			
PZAA-P7-010913	⑦-0-50		10:00	AC01453*	FCAC00454	-30.41	-3.98		X	Guage			
PZAA-P8-010913	⑧-3-18		09:45	AC0118168*	FCAC0295	-30.51	-8.59	1L	X	DV600175			
PZAA-C1-010913	⑨-1-45		15:10	AC010843*	FCAC00440	-20.40	-5.09		X				
PZAA-C2-010913	⑩-2-00		16:05	AC01028*	FCAC00516	-30.38	-5.65		X				
PZAA-C3-010913	⑪-0-56		14:05	AC01098*	FCAC02402	-30.37	-4.11		X				
PZAA-C4-010913-D	⑫-1-16		16:00	AC011908*	FCAC00091	-20.40	-5.17		X				
PZAA-C4-010913	⑬-1-34	↓	16:00	AC01131*	FCAC00511	-30.34	-6.03	↓	X				
Review													
Report Tier Levels - please select							Per SOW		Tier III (Results + QC & Calibration Summaries) _____			Project Requirements (MRLs, QAPP) Type: _____	
Tier I - Results (Default if not specified) _____							Per SOW		Tier IV (Data Validation Package) 10% Surcharge _____				
Tier II (Results + QC Summaries) _____													
Relinquished by: (Signature) <u>J. M.</u>							Date: <u>11/13</u> Time: <u>2000</u>		Received by: (Signature) <u>W. Horieuchi</u>			Date: _____ Time: _____	
Relinquished by: (Signature) _____							Date: _____ Time: _____		Received by: (Signature) _____			Date: _____ Time: _____ °C	



Air - Chain of Custody Record & Analytical Service Request

2655 Park Center Drive, Suite A
Simi Valley, California 93065
Phone (805) 526-7161
Fax (805) 526-7270

Project No. 91360114

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Requested Turnaround Time in Business Days (Surcharges) please circle							CAS Project No.	
1 Day (100%) 2 Day (75%) 3 Day (50%) 4 Day (35%) 5 Day (25%) 10 Day Standard							<u>91360114</u>	
Company Name & Address (Reporting Information)				Project Name				CAS Contact:
Columbia 1717 Arch Street Sta 1400 Philadelphia PA 19103				Pfizer Ambient Air Monitoring				K. Hyrich
Project Manager <u>Karen Mondale</u>				Project Number <u>431248.AM.FW</u>				Comments e.g. Actual Preservative or specific instructions
Phone <u>215.640.9212</u>				P.O. # / Billing Information				
Email Address for Result Reporting <u>KAREN.MONDALE@CHINN.COM</u>				Sampler (Print & Sign) <u>Leslie Preckover L.P.</u>				
Client Sample ID	Laboratory ID Number	Date Collected	Time Collected	Canister ID (Bar code # - AC, SC, etc.)	Flow Controller ID (Bar code # - FC #)	Canister Pressure "Hg	Canister End Pressure "Hg/psig	Sample Volume
PZAA-W1-010913	11-180	1/9/13	1336	AND188	FCA00179	-30.40	-5.54	10L X
PZAA-S1-010913	11-132	1/9/13	1050	AC00894	FCA00007	-30.41	-5.17	10L X
PZAA-E1-010913	11-1061	1/9/13	1615	AC00902	FCA00016	-30.43	-23.43	10L X
PZAA-N1-010913	11-1446	1/9/13	1045	AC00789	FCA00031	-30.38	-4.13	10L X
	-14.42							
	-14.40-1							
	-14.38-2							
	-14.36							
	-14.32							
Revised	Report Tier Levels - please select	Tier I - Results (Default if not specified)	Tier II - (Results + QC Summaries)	Tier III (Results + QC & Calibration Summaries)	Tier IV (Data Validation Package)	10% Surcharge	EDD required Yes / No	Project Requirements (MRLs, QAPP)
		<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Relinquished by: (Signature)	<u>J. H.</u>	Date: <u>10/13</u>	Time: <u>2000</u>	Received by: (Signature)	<u>Jeff Albee</u>	Date: <u>10/13</u>	Time: <u>0945</u>	Date: <u>10/13</u>
Relinquished by: (Signature)		Date: <u></u>	Time: <u></u>	Received by: (Signature)		Date: <u></u>	Time: <u></u>	COCAIR REV 3-11

Sample Acceptance Check Form

Client: CH2M Hill

Work order: P1300114

Project: Pfizer Ambient Air Monitoring / 431248.AM.FW

Sample(s) received on: 1/10/13

Date opened: 1/10/13

by: MZAMORA

Note: This form is used for all samples received by ALS. The use of this form for custody seals is strictly meant to indicate presence/absence and not as an indication of compliance or nonconformity. Thermal preservation and pH will only be evaluated either at the request of the client and/or as required by the method/SOP.

Yes **No** **N/A**

 1 Were **sample containers** properly marked with client sample ID?

 2 Container(s) **supplied by ALS**?

 3 Did **sample containers** arrive in good condition?

 4 Were **chain-of-custody** papers used and filled out?

 5 Did **sample container labels** and/or tags agree with custody papers?

 6 Was **sample volume** received adequate for analysis?

7 Are samples within specified holding times?

 8 Was proper **temperature** (thermal preservation) of cooler at receipt adhered to?

 9 Was a **trip blank** received?

 10 Were **custody seals** on outside of cooler/Box?

Location of seal(s)? _____ Sealing Lid? _____

Were signature and date included?

Were seals intact?

Were custody seals on outside of sample container?

Location of seal(s)? _____ Sealing Lid? _____

Were signature and date included?

Were seals intact?

 11 Do containers have appropriate **preservation**, according to method/SOP or Client specified information?

 Is there a client indication that the submitted samples are **pH** preserved?

 Were **VOA vials** checked for presence/absence of air bubbles?

 Does the client/method/SOP require that the analyst check the sample pH and if necessary alter it?

 12 **Tubes:** Are the tubes capped and intact?

Do they contain moisture?

 13 **Badges:** Are the badges properly capped and intact?

Are dual bed badges separated and individually capped and intact?

Lab Sample ID	Container Description	Required pH *	Received pH	Adjusted pH	VOA Headspace (Presence/Absence)	Receipt / Preservation Comments
P1300114-001.01	6.0 L Ambient Can					
P1300114-002.01	6.0 L Ambient Can					
P1300114-003.01	6.0 L Ambient Can					
P1300114-004.01	6.0 L Ambient Can					
P1300114-005.01	6.0 L Ambient Can					
P1300114-006.01	6.0 L Ambient Can					
P1300114-007.01	6.0 L Ambient Can					
P1300114-008.01	6.0 L Ambient Can					

Explain any discrepancies: (include lab sample ID numbers): _____

Flow controllers listed on COC for samples -014 & -016 were not received.

RSK - MEEPP, HCL (pH<2); RSK - CO2, (pH 5-8); Sulfur (pH>4)

Sample Acceptance Check Form

Client: CH2M Hill

Work order: P1300114

Project: Pfizer Ambient Air Monitoring / 431248.AM.FW

Sample(s) received on: 1/10/13

Date opened: 1/10/13

by: MZAMORA

Explain any discrepancies: (include lab sample ID numbers):

RSK - MEEPP, HCl (pH<2); RSK - CO₂, (pH 5-8); Sulfur (pH>4)

RESULTS OF ANALYSIS

Page 1 of 3

Client: CH2M Hill

Client Sample ID: PZAA-P1-010913

CAS Project ID: P1300114

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1300114-001

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Karen Ryan

Date Analyzed: 1/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01632

Initial Pressure (psig): -2.36 Final Pressure (psig): 3.51

Canister Dilution Factor: 1.48

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	2.1	0.74	1.2	0.43	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.2	0.74	0.44	0.15	
74-87-3	Chloromethane	0.61	0.30	0.29	0.14	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.74	ND	0.11	
75-01-4	Vinyl Chloride	ND	0.15	ND	0.058	
106-99-0	1,3-Butadiene	ND	0.30	ND	0.13	
74-83-9	Bromomethane	ND	0.15	ND	0.038	
75-00-3	Chloroethane	ND	0.15	ND	0.056	
64-17-5	Ethanol	10	7.4	5.3	3.9	
75-05-8	Acetonitrile	ND	0.74	ND	0.44	
107-02-8	Acrolein	ND	3.0	ND	1.3	
67-64-1	Acetone	16	7.4	6.9	3.1	
75-69-4	Trichlorofluoromethane	1.4	0.15	0.26	0.026	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	7.4	ND	3.0	
107-13-1	Acrylonitrile	ND	0.74	ND	0.34	
75-35-4	1,1-Dichloroethene	ND	0.15	ND	0.037	
75-09-2	Methylene Chloride	0.97	0.74	0.28	0.21	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.15	ND	0.047	
76-13-1	Trichlorotrifluoroethane	0.54	0.15	0.070	0.019	
75-15-0	Carbon Disulfide	ND	7.4	ND	2.4	
156-60-5	trans-1,2-Dichloroethene	ND	0.15	ND	0.037	
75-34-3	1,1-Dichloroethane	ND	0.15	ND	0.037	
1634-04-4	Methyl tert-Butyl Ether	ND	0.15	ND	0.041	
108-05-4	Vinyl Acetate	ND	7.4	ND	2.1	
78-93-3	2-Butanone (MEK)	ND	7.4	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-P1-010913

CAS Project ID: P1300114

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1300114-001

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Karen Ryan

Date Analyzed: 1/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01632

Initial Pressure (psig): -2.36 Final Pressure (psig): 3.51

Canister Dilution Factor: 1.48

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.15	ND	0.037	
141-78-6	Ethyl Acetate	ND	1.5	ND	0.41	
110-54-3	n-Hexane	1.1	0.74	0.31	0.21	
67-66-3	Chloroform	0.15	0.15	0.031	0.030	
109-99-9	Tetrahydrofuran (THF)	ND	0.74	ND	0.25	
107-06-2	1,2-Dichloroethane	ND	0.15	ND	0.037	
71-55-6	1,1,1-Trichloroethane	ND	0.15	ND	0.027	
71-43-2	Benzene	1.6	0.15	0.50	0.046	
56-23-5	Carbon Tetrachloride	0.47	0.15	0.075	0.024	
110-82-7	Cyclohexane	ND	1.5	ND	0.43	
78-87-5	1,2-Dichloropropane	ND	0.15	ND	0.032	
75-27-4	Bromodichloromethane	ND	0.15	ND	0.022	
79-01-6	Trichloroethene	ND	0.15	ND	0.028	
123-91-1	1,4-Dioxane	ND	0.74	ND	0.21	
80-62-6	Methyl Methacrylate	ND	1.5	ND	0.36	
142-82-5	n-Heptane	ND	0.74	ND	0.18	
10061-01-5	cis-1,3-Dichloropropene	ND	0.74	ND	0.16	
108-10-1	4-Methyl-2-pentanone	ND	0.74	ND	0.18	
10061-02-6	trans-1,3-Dichloropropene	ND	0.74	ND	0.16	
79-00-5	1,1,2-Trichloroethane	ND	0.15	ND	0.027	
108-88-3	Toluene	3.1	0.74	0.83	0.20	
591-78-6	2-Hexanone	ND	0.74	ND	0.18	
124-48-1	Dibromochloromethane	ND	0.15	ND	0.017	
106-93-4	1,2-Dibromoethane	ND	0.15	ND	0.019	
123-86-4	n-Butyl Acetate	ND	0.74	ND	0.16	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 3 of 3

Client: CH2M Hill
Client Sample ID: PZAA-P1-010913
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300114
 CAS Sample ID: P1300114-001

Test Code:	EPA TO-15	Date Collected:	1/9/13
Instrument ID:	Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8	Date Received:	1/10/13
Analyst:	Karen Ryan	Date Analyzed:	1/16/13
Sample Type:	6.0 L Summa Canister	Volume(s) Analyzed:	1.00 Liter(s)
Test Notes:			
Container ID:	AC01632		

Initial Pressure (psig): -2.36 Final Pressure (psig): 3.51

Canister Dilution Factor: 1.48

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.74	ND	0.16	
127-18-4	Tetrachloroethene	0.20	0.15	0.029	0.022	
108-90-7	Chlorobenzene	ND	0.15	ND	0.032	
100-41-4	Ethylbenzene	ND	0.74	ND	0.17	
179601-23-1	m,p-Xylenes	1.4	0.74	0.31	0.17	
75-25-2	Bromoform	ND	0.74	ND	0.072	
100-42-5	Styrene	ND	0.74	ND	0.17	
95-47-6	o-Xylene	ND	0.74	ND	0.17	
111-84-2	n-Nonane	ND	0.74	ND	0.14	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.15	ND	0.022	
98-82-8	Cumene	ND	0.74	ND	0.15	
80-56-8	alpha-Pinene	1.5	0.74	0.27	0.13	
103-65-1	n-Propylbenzene	ND	0.74	ND	0.15	
622-96-8	4-Ethyltoluene	ND	0.74	ND	0.15	
108-67-8	1,3,5-Trimethylbenzene	ND	0.74	ND	0.15	
95-63-6	1,2,4-Trimethylbenzene	ND	0.74	ND	0.15	
100-44-7	Benzyl Chloride	ND	0.74	ND	0.14	
541-73-1	1,3-Dichlorobenzene	ND	0.15	ND	0.025	
106-46-7	1,4-Dichlorobenzene	ND	0.15	ND	0.025	
95-50-1	1,2-Dichlorobenzene	ND	0.15	ND	0.025	
5989-27-5	d-Limonene	ND	0.74	ND	0.13	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.74	ND	0.077	
120-82-1	1,2,4-Trichlorobenzene	ND	0.74	ND	0.10	
91-20-3	Naphthalene	ND	0.74	ND	0.14	
87-68-3	Hexachlorobutadiene	ND	0.74	ND	0.069	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 1 of 3

Client: CH2M Hill

Client Sample ID: PZAA-P2-010913

CAS Project ID: P1300114

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1300114-002

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Karen Ryan

Date Analyzed: 1/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01101

Initial Pressure (psig): -2.12 Final Pressure (psig): 3.53

Canister Dilution Factor: 1.45

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	1.6	0.73	0.94	0.42	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.1	0.73	0.43	0.15	
74-87-3	Chloromethane	0.53	0.29	0.26	0.14	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.73	ND	0.10	
75-01-4	Vinyl Chloride	ND	0.15	ND	0.057	
106-99-0	1,3-Butadiene	ND	0.29	ND	0.13	
74-83-9	Bromomethane	ND	0.15	ND	0.037	
75-00-3	Chloroethane	ND	0.15	ND	0.055	
64-17-5	Ethanol	7.3	7.3	3.9	3.8	
75-05-8	Acetonitrile	ND	0.73	ND	0.43	
107-02-8	Acrolein	ND	2.9	ND	1.3	
67-64-1	Acetone	13	7.3	5.5	3.1	
75-69-4	Trichlorofluoromethane	2.4	0.15	0.43	0.026	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	7.3	ND	3.0	
107-13-1	Acrylonitrile	ND	0.73	ND	0.33	
75-35-4	1,1-Dichloroethene	ND	0.15	ND	0.037	
75-09-2	Methylene Chloride	0.89	0.73	0.26	0.21	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.15	ND	0.046	
76-13-1	Trichlorotrifluoroethane	0.52	0.15	0.067	0.019	
75-15-0	Carbon Disulfide	ND	7.3	ND	2.3	
156-60-5	trans-1,2-Dichloroethene	ND	0.15	ND	0.037	
75-34-3	1,1-Dichloroethane	ND	0.15	ND	0.036	
1634-04-4	Methyl tert-Butyl Ether	ND	0.15	ND	0.040	
108-05-4	Vinyl Acetate	ND	7.3	ND	2.1	
78-93-3	2-Butanone (MEK)	ND	7.3	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 2 of 3

Client: CH2M Hill

Client Sample ID: PZAA-P2-010913

CAS Project ID: P1300114

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1300114-002

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Karen Ryan

Date Analyzed: 1/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01101

Initial Pressure (psig): -2.12 Final Pressure (psig): 3.53

Canister Dilution Factor: 1.45

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.15	ND	0.037	
141-78-6	Ethyl Acetate	ND	1.5	ND	0.40	
110-54-3	n-Hexane	1.1	0.73	0.32	0.21	
67-66-3	Chloroform	0.17	0.15	0.034	0.030	
109-99-9	Tetrahydrofuran (THF)	ND	0.73	ND	0.25	
107-06-2	1,2-Dichloroethane	ND	0.15	ND	0.036	
71-55-6	1,1,1-Trichloroethane	ND	0.15	ND	0.027	
71-43-2	Benzene	2.0	0.15	0.63	0.045	
56-23-5	Carbon Tetrachloride	0.45	0.15	0.071	0.023	
110-82-7	Cyclohexane	ND	1.5	ND	0.42	
78-87-5	1,2-Dichloropropane	ND	0.15	ND	0.031	
75-27-4	Bromodichloromethane	ND	0.15	ND	0.022	
79-01-6	Trichloroethene	ND	0.15	ND	0.027	
123-91-1	1,4-Dioxane	ND	0.73	ND	0.20	
80-62-6	Methyl Methacrylate	ND	1.5	ND	0.35	
142-82-5	n-Heptane	ND	0.73	ND	0.18	
10061-01-5	cis-1,3-Dichloropropene	ND	0.73	ND	0.16	
108-10-1	4-Methyl-2-pentanone	ND	0.73	ND	0.18	
10061-02-6	trans-1,3-Dichloropropene	ND	0.73	ND	0.16	
79-00-5	1,1,2-Trichloroethane	ND	0.15	ND	0.027	
108-88-3	Toluene	3.4	0.73	0.91	0.19	
591-78-6	2-Hexanone	ND	0.73	ND	0.18	
124-48-1	Dibromochloromethane	ND	0.15	ND	0.017	
106-93-4	1,2-Dibromoethane	ND	0.15	ND	0.019	
123-86-4	n-Butyl Acetate	ND	0.73	ND	0.15	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P2-010913
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300114
 CAS Sample ID: P1300114-002

Test Code:	EPA TO-15	Date Collected:	1/9/13
Instrument ID:	Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8	Date Received:	1/10/13
Analyst:	Karen Ryan	Date Analyzed:	1/16/13
Sample Type:	6.0 L Summa Canister	Volume(s) Analyzed:	1.00 Liter(s)
Test Notes:			
Container ID:	AC01101		

Initial Pressure (psig): -2.12 Final Pressure (psig): 3.53

Canister Dilution Factor: 1.45

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.73	ND	0.16	
127-18-4	Tetrachloroethene	0.21	0.15	0.031	0.021	
108-90-7	Chlorobenzene	0.37	0.15	0.081	0.031	
100-41-4	Ethylbenzene	ND	0.73	ND	0.17	
179601-23-1	m,p-Xylenes	1.5	0.73	0.34	0.17	
75-25-2	Bromoform	ND	0.73	ND	0.070	
100-42-5	Styrene	ND	0.73	ND	0.17	
95-47-6	o-Xylene	ND	0.73	ND	0.17	
111-84-2	n-Nonane	ND	0.73	ND	0.14	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.15	ND	0.021	
98-82-8	Cumene	ND	0.73	ND	0.15	
80-56-8	alpha-Pinene	2.4	0.73	0.44	0.13	
103-65-1	n-Propylbenzene	ND	0.73	ND	0.15	
622-96-8	4-Ethyltoluene	ND	0.73	ND	0.15	
108-67-8	1,3,5-Trimethylbenzene	ND	0.73	ND	0.15	
95-63-6	1,2,4-Trimethylbenzene	ND	0.73	ND	0.15	
100-44-7	Benzyl Chloride	ND	0.73	ND	0.14	
541-73-1	1,3-Dichlorobenzene	ND	0.15	ND	0.024	
106-46-7	1,4-Dichlorobenzene	ND	0.15	ND	0.024	
95-50-1	1,2-Dichlorobenzene	ND	0.15	ND	0.024	
5989-27-5	d-Limonene	0.95	0.73	0.17	0.13	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.73	ND	0.075	
120-82-1	1,2,4-Trichlorobenzene	ND	0.73	ND	0.098	
91-20-3	Naphthalene	ND	0.73	ND	0.14	
87-68-3	Hexachlorobutadiene	ND	0.73	ND	0.068	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-P3-010913

CAS Project ID: P1300114

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1300114-003

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Karen Ryan

Date Analyzed: 1/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:

Container ID: AC01039

Initial Pressure (psig): -2.15 Final Pressure (psig): 3.54

Canister Dilution Factor: 1.45

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	1.6	0.73	0.91	0.42	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.1	0.73	0.43	0.15	
74-87-3	Chloromethane	0.56	0.29	0.27	0.14	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.73	ND	0.10	
75-01-4	Vinyl Chloride	ND	0.15	ND	0.057	
106-99-0	1,3-Butadiene	ND	0.29	ND	0.13	
74-83-9	Bromomethane	ND	0.15	ND	0.037	
75-00-3	Chloroethane	ND	0.15	ND	0.055	
64-17-5	Ethanol	ND	7.3	ND	3.8	
75-05-8	Acetonitrile	ND	0.73	ND	0.43	
107-02-8	Acrolein	ND	2.9	ND	1.3	
67-64-1	Acetone	9.3	7.3	3.9	3.1	
75-69-4	Trichlorofluoromethane	2.1	0.15	0.38	0.026	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	7.3	ND	3.0	
107-13-1	Acrylonitrile	ND	0.73	ND	0.33	
75-35-4	1,1-Dichloroethene	ND	0.15	ND	0.037	
75-09-2	Methylene Chloride	0.89	0.73	0.26	0.21	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.15	ND	0.046	
76-13-1	Trichlorotrifluoroethane	0.53	0.15	0.069	0.019	
75-15-0	Carbon Disulfide	9.1	7.3	2.9	2.3	
156-60-5	trans-1,2-Dichloroethene	ND	0.15	ND	0.037	
75-34-3	1,1-Dichloroethane	ND	0.15	ND	0.036	
1634-04-4	Methyl tert-Butyl Ether	ND	0.15	ND	0.040	
108-05-4	Vinyl Acetate	ND	7.3	ND	2.1	
78-93-3	2-Butanone (MEK)	ND	7.3	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-P3-010913

CAS Project ID: P1300114

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1300114-003

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Karen Ryan

Date Analyzed: 1/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01039

Initial Pressure (psig): -2.15 Final Pressure (psig): 3.54

Canister Dilution Factor: 1.45

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.15	ND	0.037	
141-78-6	Ethyl Acetate	ND	1.5	ND	0.40	
110-54-3	n-Hexane	1.0	0.73	0.29	0.21	
67-66-3	Chloroform	0.18	0.15	0.037	0.030	
109-99-9	Tetrahydrofuran (THF)	ND	0.73	ND	0.25	
107-06-2	1,2-Dichloroethane	ND	0.15	ND	0.036	
71-55-6	1,1,1-Trichloroethane	ND	0.15	ND	0.027	
71-43-2	Benzene	3.4	0.15	1.1	0.045	
56-23-5	Carbon Tetrachloride	0.44	0.15	0.070	0.023	
110-82-7	Cyclohexane	ND	1.5	ND	0.42	
78-87-5	1,2-Dichloropropane	ND	0.15	ND	0.031	
75-27-4	Bromodichloromethane	ND	0.15	ND	0.022	
79-01-6	Trichloroethene	ND	0.15	ND	0.027	
123-91-1	1,4-Dioxane	ND	0.73	ND	0.20	
80-62-6	Methyl Methacrylate	ND	1.5	ND	0.35	
142-82-5	n-Heptane	ND	0.73	ND	0.18	
10061-01-5	cis-1,3-Dichloropropene	ND	0.73	ND	0.16	
108-10-1	4-Methyl-2-pentanone	ND	0.73	ND	0.18	
10061-02-6	trans-1,3-Dichloropropene	ND	0.73	ND	0.16	
79-00-5	1,1,2-Trichloroethane	ND	0.15	ND	0.027	
108-88-3	Toluene	3.4	0.73	0.89	0.19	
591-78-6	2-Hexanone	ND	0.73	ND	0.18	
124-48-1	Dibromochloromethane	ND	0.15	ND	0.017	
106-93-4	1,2-Dibromoethane	ND	0.15	ND	0.019	
123-86-4	n-Butyl Acetate	ND	0.73	ND	0.15	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P3-010913
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300114
 CAS Sample ID: P1300114-003

Test Code:	EPA TO-15	Date Collected:	1/9/13
Instrument ID:	Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8	Date Received:	1/10/13
Analyst:	Karen Ryan	Date Analyzed:	1/16/13
Sample Type:	6.0 L Summa Canister	Volume(s) Analyzed:	1.00 Liter(s)
Test Notes:			
Container ID:	AC01039		

Initial Pressure (psig): -2.15 Final Pressure (psig): 3.54

Canister Dilution Factor: 1.45

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.73	ND	0.16	
127-18-4	Tetrachloroethene	0.21	0.15	0.031	0.021	
108-90-7	Chlorobenzene	1.6	0.15	0.35	0.031	
100-41-4	Ethylbenzene	ND	0.73	ND	0.17	
179601-23-1	m,p-Xylenes	1.4	0.73	0.33	0.17	
75-25-2	Bromoform	ND	0.73	ND	0.070	
100-42-5	Styrene	ND	0.73	ND	0.17	
95-47-6	o-Xylene	ND	0.73	ND	0.17	
111-84-2	n-Nonane	ND	0.73	ND	0.14	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.15	ND	0.021	
98-82-8	Cumene	ND	0.73	ND	0.15	
80-56-8	alpha-Pinene	2.0	0.73	0.35	0.13	
103-65-1	n-Propylbenzene	ND	0.73	ND	0.15	
622-96-8	4-Ethyltoluene	ND	0.73	ND	0.15	
108-67-8	1,3,5-Trimethylbenzene	ND	0.73	ND	0.15	
95-63-6	1,2,4-Trimethylbenzene	ND	0.73	ND	0.15	
100-44-7	Benzyl Chloride	ND	0.73	ND	0.14	
541-73-1	1,3-Dichlorobenzene	ND	0.15	ND	0.024	
106-46-7	1,4-Dichlorobenzene	ND	0.15	ND	0.024	
95-50-1	1,2-Dichlorobenzene	0.22	0.15	0.036	0.024	
5989-27-5	d-Limonene	ND	0.73	ND	0.13	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.73	ND	0.075	
120-82-1	1,2,4-Trichlorobenzene	ND	0.73	ND	0.098	
91-20-3	Naphthalene	ND	0.73	ND	0.14	
87-68-3	Hexachlorobutadiene	ND	0.73	ND	0.068	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 1 of 3

Client: CH2M Hill

Client Sample ID: PZAA-P4-010913

CAS Project ID: P1300114

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1300114-004

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Karen Ryan

Date Analyzed: 1/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01769

Initial Pressure (psig): -0.95 Final Pressure (psig): 3.52

Canister Dilution Factor: 1.33

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	1.6	0.67	0.91	0.39	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.2	0.67	0.44	0.13	
74-87-3	Chloromethane	0.57	0.27	0.28	0.13	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.67	ND	0.095	
75-01-4	Vinyl Chloride	ND	0.13	ND	0.052	
106-99-0	1,3-Butadiene	ND	0.27	ND	0.12	
74-83-9	Bromomethane	ND	0.13	ND	0.034	
75-00-3	Chloroethane	ND	0.13	ND	0.050	
64-17-5	Ethanol	9.5	6.7	5.1	3.5	
75-05-8	Acetonitrile	ND	0.67	ND	0.40	
107-02-8	Acrolein	ND	2.7	ND	1.2	
67-64-1	Acetone	7.3	6.7	3.1	2.8	
75-69-4	Trichlorofluoromethane	1.5	0.13	0.27	0.024	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	6.7	ND	2.7	
107-13-1	Acrylonitrile	ND	0.67	ND	0.31	
75-35-4	1,1-Dichloroethene	ND	0.13	ND	0.034	
75-09-2	Methylene Chloride	0.82	0.67	0.24	0.19	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.13	ND	0.043	
76-13-1	Trichlorotrifluoroethane	0.53	0.13	0.069	0.017	
75-15-0	Carbon Disulfide	ND	6.7	ND	2.1	
156-60-5	trans-1,2-Dichloroethene	ND	0.13	ND	0.034	
75-34-3	1,1-Dichloroethane	ND	0.13	ND	0.033	
1634-04-4	Methyl tert-Butyl Ether	ND	0.13	ND	0.037	
108-05-4	Vinyl Acetate	ND	6.7	ND	1.9	
78-93-3	2-Butanone (MEK)	ND	6.7	ND	2.3	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 2 of 3

Client: CH2M Hill

Client Sample ID: PZAA-P4-010913

CAS Project ID: P1300114

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1300114-004

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Karen Ryan

Date Analyzed: 1/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01769

Initial Pressure (psig): -0.95 Final Pressure (psig): 3.52

Canister Dilution Factor: 1.33

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.13	ND	0.034	
141-78-6	Ethyl Acetate	2.1	1.3	0.59	0.37	
110-54-3	n-Hexane	0.97	0.67	0.28	0.19	
67-66-3	Chloroform	0.18	0.13	0.038	0.027	
109-99-9	Tetrahydrofuran (THF)	ND	0.67	ND	0.23	
107-06-2	1,2-Dichloroethane	ND	0.13	ND	0.033	
71-55-6	1,1,1-Trichloroethane	ND	0.13	ND	0.024	
71-43-2	Benzene	3.0	0.13	0.94	0.042	
56-23-5	Carbon Tetrachloride	0.49	0.13	0.077	0.021	
110-82-7	Cyclohexane	ND	1.3	ND	0.39	
78-87-5	1,2-Dichloropropane	ND	0.13	ND	0.029	
75-27-4	Bromodichloromethane	ND	0.13	ND	0.020	
79-01-6	Trichloroethene	ND	0.13	ND	0.025	
123-91-1	1,4-Dioxane	ND	0.67	ND	0.18	
80-62-6	Methyl Methacrylate	ND	1.3	ND	0.32	
142-82-5	n-Heptane	ND	0.67	ND	0.16	
10061-01-5	cis-1,3-Dichloropropene	ND	0.67	ND	0.15	
108-10-1	4-Methyl-2-pentanone	ND	0.67	ND	0.16	
10061-02-6	trans-1,3-Dichloropropene	ND	0.67	ND	0.15	
79-00-5	1,1,2-Trichloroethane	ND	0.13	ND	0.024	
108-88-3	Toluene	3.2	0.67	0.85	0.18	
591-78-6	2-Hexanone	ND	0.67	ND	0.16	
124-48-1	Dibromochloromethane	ND	0.13	ND	0.016	
106-93-4	1,2-Dibromoethane	ND	0.13	ND	0.017	
123-86-4	n-Butyl Acetate	ND	0.67	ND	0.14	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P4-010913
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300114
 CAS Sample ID: P1300114-004

Test Code:	EPA TO-15	Date Collected:	1/9/13
Instrument ID:	Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8	Date Received:	1/10/13
Analyst:	Karen Ryan	Date Analyzed:	1/16/13
Sample Type:	6.0 L Summa Canister	Volume(s) Analyzed:	1.00 Liter(s)
Test Notes:			
Container ID:	AC01769		

Initial Pressure (psig): -0.95 Final Pressure (psig): 3.52

Canister Dilution Factor: 1.33

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.67	ND	0.14	
127-18-4	Tetrachloroethene	0.20	0.13	0.029	0.020	
108-90-7	Chlorobenzene	0.29	0.13	0.064	0.029	
100-41-4	Ethylbenzene	ND	0.67	ND	0.15	
179601-23-1	m,p-Xylenes	1.3	0.67	0.29	0.15	
75-25-2	Bromoform	ND	0.67	ND	0.064	
100-42-5	Styrene	ND	0.67	ND	0.16	
95-47-6	o-Xylene	ND	0.67	ND	0.15	
111-84-2	n-Nonane	ND	0.67	ND	0.13	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.13	ND	0.019	
98-82-8	Cumene	ND	0.67	ND	0.14	
80-56-8	alpha-Pinene	1.6	0.67	0.29	0.12	
103-65-1	n-Propylbenzene	ND	0.67	ND	0.14	
622-96-8	4-Ethyltoluene	ND	0.67	ND	0.14	
108-67-8	1,3,5-Trimethylbenzene	ND	0.67	ND	0.14	
95-63-6	1,2,4-Trimethylbenzene	ND	0.67	ND	0.14	
100-44-7	Benzyl Chloride	ND	0.67	ND	0.13	
541-73-1	1,3-Dichlorobenzene	ND	0.13	ND	0.022	
106-46-7	1,4-Dichlorobenzene	ND	0.13	ND	0.022	
95-50-1	1,2-Dichlorobenzene	ND	0.13	ND	0.022	
5989-27-5	d-Limonene	0.70	0.67	0.13	0.12	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.67	ND	0.069	
120-82-1	1,2,4-Trichlorobenzene	ND	0.67	ND	0.090	
91-20-3	Naphthalene	ND	0.67	ND	0.13	
87-68-3	Hexachlorobutadiene	ND	0.67	ND	0.062	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 1 of 3

Client: CH2M Hill

Client Sample ID: PZAA-P5-010913

CAS Project ID: P1300114

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1300114-005

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Karen Ryan

Date Analyzed: 1/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01407

Initial Pressure (psig): -1.52 Final Pressure (psig): 3.54

Canister Dilution Factor: 1.38

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	1.4	0.69	0.83	0.40	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.2	0.69	0.44	0.14	
74-87-3	Chloromethane	0.55	0.28	0.27	0.13	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.69	ND	0.099	
75-01-4	Vinyl Chloride	ND	0.14	ND	0.054	
106-99-0	1,3-Butadiene	ND	0.28	ND	0.12	
74-83-9	Bromomethane	ND	0.14	ND	0.036	
75-00-3	Chloroethane	ND	0.14	ND	0.052	
64-17-5	Ethanol	ND	6.9	ND	3.7	
75-05-8	Acetonitrile	ND	0.69	ND	0.41	
107-02-8	Acrolein	ND	2.8	ND	1.2	
67-64-1	Acetone	8.1	6.9	3.4	2.9	
75-69-4	Trichlorofluoromethane	1.4	0.14	0.24	0.025	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	6.9	ND	2.8	
107-13-1	Acrylonitrile	ND	0.69	ND	0.32	
75-35-4	1,1-Dichloroethene	ND	0.14	ND	0.035	
75-09-2	Methylene Chloride	0.83	0.69	0.24	0.20	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.14	ND	0.044	
76-13-1	Trichlorotrifluoroethane	0.54	0.14	0.070	0.018	
75-15-0	Carbon Disulfide	ND	6.9	ND	2.2	
156-60-5	trans-1,2-Dichloroethene	ND	0.14	ND	0.035	
75-34-3	1,1-Dichloroethane	ND	0.14	ND	0.034	
1634-04-4	Methyl tert-Butyl Ether	ND	0.14	ND	0.038	
108-05-4	Vinyl Acetate	ND	6.9	ND	2.0	
78-93-3	2-Butanone (MEK)	ND	6.9	ND	2.3	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-P5-010913

CAS Project ID: P1300114

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1300114-005

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Karen Ryan

Date Analyzed: 1/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01407

Initial Pressure (psig): -1.52 Final Pressure (psig): 3.54

Canister Dilution Factor: 1.38

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.14	ND	0.035	
141-78-6	Ethyl Acetate	ND	1.4	ND	0.38	
110-54-3	n-Hexane	0.92	0.69	0.26	0.20	
67-66-3	Chloroform	0.21	0.14	0.043	0.028	
109-99-9	Tetrahydrofuran (THF)	ND	0.69	ND	0.23	
107-06-2	1,2-Dichloroethane	ND	0.14	ND	0.034	
71-55-6	1,1,1-Trichloroethane	ND	0.14	ND	0.025	
71-43-2	Benzene	2.0	0.14	0.61	0.043	
56-23-5	Carbon Tetrachloride	0.47	0.14	0.075	0.022	
110-82-7	Cyclohexane	ND	1.4	ND	0.40	
78-87-5	1,2-Dichloropropane	ND	0.14	ND	0.030	
75-27-4	Bromodichloromethane	ND	0.14	ND	0.021	
79-01-6	Trichloroethene	ND	0.14	ND	0.026	
123-91-1	1,4-Dioxane	ND	0.69	ND	0.19	
80-62-6	Methyl Methacrylate	ND	1.4	ND	0.34	
142-82-5	n-Heptane	ND	0.69	ND	0.17	
10061-01-5	cis-1,3-Dichloropropene	ND	0.69	ND	0.15	
108-10-1	4-Methyl-2-pentanone	ND	0.69	ND	0.17	
10061-02-6	trans-1,3-Dichloropropene	ND	0.69	ND	0.15	
79-00-5	1,1,2-Trichloroethane	ND	0.14	ND	0.025	
108-88-3	Toluene	3.1	0.69	0.82	0.18	
591-78-6	2-Hexanone	ND	0.69	ND	0.17	
124-48-1	Dibromochloromethane	ND	0.14	ND	0.016	
106-93-4	1,2-Dibromoethane	ND	0.14	ND	0.018	
123-86-4	n-Butyl Acetate	ND	0.69	ND	0.15	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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C
CH2M Hill
CAS Project ID: P1300114
Client Sample ID: PZAA-P5-010913
CAS Sample ID: P1300114-005
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

Test Code:	EPA TO-15	Date Collected:	1/9/13
Instrument ID:	Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8	Date Received:	1/10/13
Analyst:	Karen Ryan	Date Analyzed:	1/16/13
Sample Type:	6.0 L Summa Canister	Volume(s) Analyzed:	1.00 Liter(s)
Test Notes:			
Container ID:	AC01407		

Initial Pressure (psig): -1.52 Final Pressure (psig): 3.54

Canister Dilution Factor: 1.38

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.69	ND	0.15	
127-18-4	Tetrachloroethene	0.18	0.14	0.026	0.020	
108-90-7	Chlorobenzene	0.39	0.14	0.085	0.030	
100-41-4	Ethylbenzene	ND	0.69	ND	0.16	
179601-23-1	m,p-Xylenes	1.3	0.69	0.29	0.16	
75-25-2	Bromoform	ND	0.69	ND	0.067	
100-42-5	Styrene	ND	0.69	ND	0.16	
95-47-6	o-Xylene	ND	0.69	ND	0.16	
111-84-2	n-Nonane	ND	0.69	ND	0.13	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.14	ND	0.020	
98-82-8	Cumene	ND	0.69	ND	0.14	
80-56-8	alpha-Pinene	1.5	0.69	0.28	0.12	
103-65-1	n-Propylbenzene	ND	0.69	ND	0.14	
622-96-8	4-Ethyltoluene	ND	0.69	ND	0.14	
108-67-8	1,3,5-Trimethylbenzene	ND	0.69	ND	0.14	
95-63-6	1,2,4-Trimethylbenzene	ND	0.69	ND	0.14	
100-44-7	Benzyl Chloride	ND	0.69	ND	0.13	
541-73-1	1,3-Dichlorobenzene	ND	0.14	ND	0.023	
106-46-7	1,4-Dichlorobenzene	ND	0.14	ND	0.023	
95-50-1	1,2-Dichlorobenzene	ND	0.14	ND	0.023	
5989-27-5	d-Limonene	ND	0.69	ND	0.12	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.69	ND	0.071	
120-82-1	1,2,4-Trichlorobenzene	ND	0.69	ND	0.093	
91-20-3	Naphthalene	ND	0.69	ND	0.13	
87-68-3	Hexachlorobutadiene	ND	0.69	ND	0.065	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-P6-010913

CAS Project ID: P1300114

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1300114-006

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Karen Ryan

Date Analyzed: 1/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01948

Initial Pressure (psig): -1.36 Final Pressure (psig): 3.52

Canister Dilution Factor: 1.37

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	1.8	0.69	1.1	0.40	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.1	0.69	0.43	0.14	
74-87-3	Chloromethane	0.57	0.27	0.28	0.13	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.69	ND	0.098	
75-01-4	Vinyl Chloride	ND	0.14	ND	0.054	
106-99-0	1,3-Butadiene	ND	0.27	ND	0.12	
74-83-9	Bromomethane	ND	0.14	ND	0.035	
75-00-3	Chloroethane	ND	0.14	ND	0.052	
64-17-5	Ethanol	10	6.9	5.5	3.6	
75-05-8	Acetonitrile	ND	0.69	ND	0.41	
107-02-8	Acrolein	ND	2.7	ND	1.2	
67-64-1	Acetone	7.0	6.9	3.0	2.9	
75-69-4	Trichlorofluoromethane	1.3	0.14	0.23	0.024	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	6.9	ND	2.8	
107-13-1	Acrylonitrile	ND	0.69	ND	0.32	
75-35-4	1,1-Dichloroethene	ND	0.14	ND	0.035	
75-09-2	Methylene Chloride	0.78	0.69	0.23	0.20	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.14	ND	0.044	
76-13-1	Trichlorotrifluoroethane	0.54	0.14	0.070	0.018	
75-15-0	Carbon Disulfide	ND	6.9	ND	2.2	
156-60-5	trans-1,2-Dichloroethene	ND	0.14	ND	0.035	
75-34-3	1,1-Dichloroethane	ND	0.14	ND	0.034	
1634-04-4	Methyl tert-Butyl Ether	ND	0.14	ND	0.038	
108-05-4	Vinyl Acetate	ND	6.9	ND	1.9	
78-93-3	2-Butanone (MEK)	ND	6.9	ND	2.3	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-P6-010913

CAS Project ID: P1300114

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1300114-006

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Karen Ryan

Date Analyzed: 1/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01948

Initial Pressure (psig): -1.36 Final Pressure (psig): 3.52

Canister Dilution Factor: 1.37

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.14	ND	0.035	
141-78-6	Ethyl Acetate	3.4	1.4	0.95	0.38	
110-54-3	n-Hexane	0.90	0.69	0.25	0.19	
67-66-3	Chloroform	0.22	0.14	0.044	0.028	
109-99-9	Tetrahydrofuran (THF)	ND	0.69	ND	0.23	
107-06-2	1,2-Dichloroethane	ND	0.14	ND	0.034	
71-55-6	1,1,1-Trichloroethane	ND	0.14	ND	0.025	
71-43-2	Benzene	1.3	0.14	0.39	0.043	
56-23-5	Carbon Tetrachloride	0.48	0.14	0.077	0.022	
110-82-7	Cyclohexane	ND	1.4	ND	0.40	
78-87-5	1,2-Dichloropropane	ND	0.14	ND	0.030	
75-27-4	Bromodichloromethane	ND	0.14	ND	0.020	
79-01-6	Trichloroethene	ND	0.14	ND	0.026	
123-91-1	1,4-Dioxane	ND	0.69	ND	0.19	
80-62-6	Methyl Methacrylate	ND	1.4	ND	0.33	
142-82-5	n-Heptane	ND	0.69	ND	0.17	
10061-01-5	cis-1,3-Dichloropropene	ND	0.69	ND	0.15	
108-10-1	4-Methyl-2-pentanone	ND	0.69	ND	0.17	
10061-02-6	trans-1,3-Dichloropropene	ND	0.69	ND	0.15	
79-00-5	1,1,2-Trichloroethane	ND	0.14	ND	0.025	
108-88-3	Toluene	2.8	0.69	0.75	0.18	
591-78-6	2-Hexanone	ND	0.69	ND	0.17	
124-48-1	Dibromochloromethane	ND	0.14	ND	0.016	
106-93-4	1,2-Dibromoethane	ND	0.14	ND	0.018	
123-86-4	n-Butyl Acetate	ND	0.69	ND	0.14	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P6-010913
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300114
 CAS Sample ID: P1300114-006

Test Code:	EPA TO-15	Date Collected:	1/9/13
Instrument ID:	Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8	Date Received:	1/10/13
Analyst:	Karen Ryan	Date Analyzed:	1/16/13
Sample Type:	6.0 L Summa Canister	Volume(s) Analyzed:	1.00 Liter(s)
Test Notes:			
Container ID:	AC01948		

Initial Pressure (psig): -1.36 Final Pressure (psig): 3.52

Canister Dilution Factor: 1.37

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.69	ND	0.15	
127-18-4	Tetrachloroethene	0.17	0.14	0.025	0.020	
108-90-7	Chlorobenzene	ND	0.14	ND	0.030	
100-41-4	Ethylbenzene	ND	0.69	ND	0.16	
179601-23-1	m,p-Xylenes	1.2	0.69	0.27	0.16	
75-25-2	Bromoform	ND	0.69	ND	0.066	
100-42-5	Styrene	ND	0.69	ND	0.16	
95-47-6	o-Xylene	ND	0.69	ND	0.16	
111-84-2	n-Nonane	ND	0.69	ND	0.13	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.14	ND	0.020	
98-82-8	Cumene	ND	0.69	ND	0.14	
80-56-8	alpha-Pinene	1.6	0.69	0.29	0.12	
103-65-1	n-Propylbenzene	ND	0.69	ND	0.14	
622-96-8	4-Ethyltoluene	ND	0.69	ND	0.14	
108-67-8	1,3,5-Trimethylbenzene	ND	0.69	ND	0.14	
95-63-6	1,2,4-Trimethylbenzene	ND	0.69	ND	0.14	
100-44-7	Benzyl Chloride	ND	0.69	ND	0.13	
541-73-1	1,3-Dichlorobenzene	ND	0.14	ND	0.023	
106-46-7	1,4-Dichlorobenzene	ND	0.14	ND	0.023	
95-50-1	1,2-Dichlorobenzene	ND	0.14	ND	0.023	
5989-27-5	d-Limonene	ND	0.69	ND	0.12	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.69	ND	0.071	
120-82-1	1,2,4-Trichlorobenzene	ND	0.69	ND	0.092	
91-20-3	Naphthalene	ND	0.69	ND	0.13	
87-68-3	Hexachlorobutadiene	ND	0.69	ND	0.064	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-P7-010913

CAS Project ID: P1300114

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1300114-007

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Karen Ryan

Date Analyzed: 1/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:

Container ID: AC01453

Initial Pressure (psig): -0.85 Final Pressure (psig): 3.53

Canister Dilution Factor: 1.32

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	1.5	0.66	0.88	0.38	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.1	0.66	0.43	0.13	
74-87-3	Chloromethane	0.52	0.26	0.25	0.13	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.66	ND	0.094	
75-01-4	Vinyl Chloride	ND	0.13	ND	0.052	
106-99-0	1,3-Butadiene	ND	0.26	ND	0.12	
74-83-9	Bromomethane	ND	0.13	ND	0.034	
75-00-3	Chloroethane	ND	0.13	ND	0.050	
64-17-5	Ethanol	7.1	6.6	3.8	3.5	
75-05-8	Acetonitrile	ND	0.66	ND	0.39	
107-02-8	Acrolein	ND	2.6	ND	1.2	
67-64-1	Acetone	7.8	6.6	3.3	2.8	
75-69-4	Trichlorofluoromethane	1.3	0.13	0.24	0.023	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	6.6	ND	2.7	
107-13-1	Acrylonitrile	ND	0.66	ND	0.30	
75-35-4	1,1-Dichloroethene	ND	0.13	ND	0.033	
75-09-2	Methylene Chloride	0.82	0.66	0.24	0.19	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.13	ND	0.042	
76-13-1	Trichlorotrifluoroethane	0.55	0.13	0.072	0.017	
75-15-0	Carbon Disulfide	ND	6.6	ND	2.1	
156-60-5	trans-1,2-Dichloroethene	ND	0.13	ND	0.033	
75-34-3	1,1-Dichloroethane	ND	0.13	ND	0.033	
1634-04-4	Methyl tert-Butyl Ether	ND	0.13	ND	0.037	
108-05-4	Vinyl Acetate	ND	6.6	ND	1.9	
78-93-3	2-Butanone (MEK)	ND	6.6	ND	2.2	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-P7-010913

CAS Project ID: P1300114

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1300114-007

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Karen Ryan

Date Analyzed: 1/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01453

Initial Pressure (psig): -0.85 Final Pressure (psig): 3.53

Canister Dilution Factor: 1.32

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.13	ND	0.033	
141-78-6	Ethyl Acetate	ND	1.3	ND	0.37	
110-54-3	n-Hexane	0.88	0.66	0.25	0.19	
67-66-3	Chloroform	0.18	0.13	0.036	0.027	
109-99-9	Tetrahydrofuran (THF)	ND	0.66	ND	0.22	
107-06-2	1,2-Dichloroethane	ND	0.13	ND	0.033	
71-55-6	1,1,1-Trichloroethane	ND	0.13	ND	0.024	
71-43-2	Benzene	1.4	0.13	0.45	0.041	
56-23-5	Carbon Tetrachloride	0.45	0.13	0.072	0.021	
110-82-7	Cyclohexane	ND	1.3	ND	0.38	
78-87-5	1,2-Dichloropropane	ND	0.13	ND	0.029	
75-27-4	Bromodichloromethane	ND	0.13	ND	0.020	
79-01-6	Trichloroethene	ND	0.13	ND	0.025	
123-91-1	1,4-Dioxane	ND	0.66	ND	0.18	
80-62-6	Methyl Methacrylate	ND	1.3	ND	0.32	
142-82-5	n-Heptane	ND	0.66	ND	0.16	
10061-01-5	cis-1,3-Dichloropropene	ND	0.66	ND	0.15	
108-10-1	4-Methyl-2-pentanone	ND	0.66	ND	0.16	
10061-02-6	trans-1,3-Dichloropropene	ND	0.66	ND	0.15	
79-00-5	1,1,2-Trichloroethane	ND	0.13	ND	0.024	
108-88-3	Toluene	3.0	0.66	0.80	0.18	
591-78-6	2-Hexanone	ND	0.66	ND	0.16	
124-48-1	Dibromochloromethane	ND	0.13	ND	0.016	
106-93-4	1,2-Dibromoethane	ND	0.13	ND	0.017	
123-86-4	n-Butyl Acetate	ND	0.66	ND	0.14	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

CAS Project ID: P1300114

Client Sample ID: PZAA-P7-010913

CAS Sample ID: P1300114-007

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Karen Ryan

Date Analyzed: 1/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:

Container ID: AC01453

Initial Pressure (psig): -0.85 Final Pressure (psig): 3.53

Canister Dilution Factor: 1.32

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.66	ND	0.14	
127-18-4	Tetrachloroethene	0.20	0.13	0.030	0.019	
108-90-7	Chlorobenzene	0.27	0.13	0.059	0.029	
100-41-4	Ethylbenzene	ND	0.66	ND	0.15	
179601-23-1	m,p-Xylenes	1.1	0.66	0.25	0.15	
75-25-2	Bromoform	ND	0.66	ND	0.064	
100-42-5	Styrene	ND	0.66	ND	0.16	
95-47-6	o-Xylene	ND	0.66	ND	0.15	
111-84-2	n-Nonane	ND	0.66	ND	0.13	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.13	ND	0.019	
98-82-8	Cumene	ND	0.66	ND	0.13	
80-56-8	alpha-Pinene	2.5	0.66	0.45	0.12	
103-65-1	n-Propylbenzene	ND	0.66	ND	0.13	
622-96-8	4-Ethyltoluene	ND	0.66	ND	0.13	
108-67-8	1,3,5-Trimethylbenzene	ND	0.66	ND	0.13	
95-63-6	1,2,4-Trimethylbenzene	ND	0.66	ND	0.13	
100-44-7	Benzyl Chloride	ND	0.66	ND	0.13	
541-73-1	1,3-Dichlorobenzene	ND	0.13	ND	0.022	
106-46-7	1,4-Dichlorobenzene	ND	0.13	ND	0.022	
95-50-1	1,2-Dichlorobenzene	ND	0.13	ND	0.022	
5989-27-5	d-Limonene	0.89	0.66	0.16	0.12	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.66	ND	0.068	
120-82-1	1,2,4-Trichlorobenzene	ND	0.66	ND	0.089	
91-20-3	Naphthalene	ND	0.66	ND	0.13	
87-68-3	Hexachlorobutadiene	ND	0.66	ND	0.062	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 1 of 3

Client: CH2M Hill

Client Sample ID: PZAA-P8-010913

CAS Project ID: P1300114

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1300114-008

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Karen Ryan

Date Analyzed: 1/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:

Container ID: AC01868

Initial Pressure (psig): -3.21 Final Pressure (psig): 3.61

Canister Dilution Factor: 1.59

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	1.5	0.80	0.86	0.46	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.2	0.80	0.44	0.16	
74-87-3	Chloromethane	0.55	0.32	0.27	0.15	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.80	ND	0.11	
75-01-4	Vinyl Chloride	ND	0.16	ND	0.062	
106-99-0	1,3-Butadiene	ND	0.32	ND	0.14	
74-83-9	Bromomethane	ND	0.16	ND	0.041	
75-00-3	Chloroethane	ND	0.16	ND	0.060	
64-17-5	Ethanol	ND	8.0	ND	4.2	
75-05-8	Acetonitrile	ND	0.80	ND	0.47	
107-02-8	Acrolein	ND	3.2	ND	1.4	
67-64-1	Acetone	ND	8.0	ND	3.3	
75-69-4	Trichlorofluoromethane	2.1	0.16	0.38	0.028	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	8.0	ND	3.2	
107-13-1	Acrylonitrile	ND	0.80	ND	0.37	
75-35-4	1,1-Dichloroethene	ND	0.16	ND	0.040	
75-09-2	Methylene Chloride	1.2	0.80	0.34	0.23	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.16	ND	0.051	
76-13-1	Trichlorotrifluoroethane	0.52	0.16	0.068	0.021	
75-15-0	Carbon Disulfide	ND	8.0	ND	2.6	
156-60-5	trans-1,2-Dichloroethene	ND	0.16	ND	0.040	
75-34-3	1,1-Dichloroethane	ND	0.16	ND	0.039	
1634-04-4	Methyl tert-Butyl Ether	ND	0.16	ND	0.044	
108-05-4	Vinyl Acetate	ND	8.0	ND	2.3	
78-93-3	2-Butanone (MEK)	ND	8.0	ND	2.7	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-P8-010913

CAS Project ID: P1300114

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1300114-008

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Karen Ryan

Date Analyzed: 1/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01868

Initial Pressure (psig): -3.21 Final Pressure (psig): 3.61

Canister Dilution Factor: 1.59

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.16	ND	0.040	
141-78-6	Ethyl Acetate	1.7	1.6	0.47	0.44	
110-54-3	n-Hexane	0.98	0.80	0.28	0.23	
67-66-3	Chloroform	0.16	0.16	0.033	0.033	
109-99-9	Tetrahydrofuran (THF)	ND	0.80	ND	0.27	
107-06-2	1,2-Dichloroethane	ND	0.16	ND	0.039	
71-55-6	1,1,1-Trichloroethane	ND	0.16	ND	0.029	
71-43-2	Benzene	1.4	0.16	0.43	0.050	
56-23-5	Carbon Tetrachloride	0.48	0.16	0.076	0.025	
110-82-7	Cyclohexane	ND	1.6	ND	0.46	
78-87-5	1,2-Dichloropropane	ND	0.16	ND	0.034	
75-27-4	Bromodichloromethane	ND	0.16	ND	0.024	
79-01-6	Trichloroethene	ND	0.16	ND	0.030	
123-91-1	1,4-Dioxane	ND	0.80	ND	0.22	
80-62-6	Methyl Methacrylate	ND	1.6	ND	0.39	
142-82-5	n-Heptane	ND	0.80	ND	0.19	
10061-01-5	cis-1,3-Dichloropropene	ND	0.80	ND	0.18	
108-10-1	4-Methyl-2-pentanone	ND	0.80	ND	0.19	
10061-02-6	trans-1,3-Dichloropropene	ND	0.80	ND	0.18	
79-00-5	1,1,2-Trichloroethane	ND	0.16	ND	0.029	
108-88-3	Toluene	3.2	0.80	0.84	0.21	
591-78-6	2-Hexanone	ND	0.80	ND	0.19	
124-48-1	Dibromochloromethane	ND	0.16	ND	0.019	
106-93-4	1,2-Dibromoethane	ND	0.16	ND	0.021	
123-86-4	n-Butyl Acetate	ND	0.80	ND	0.17	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P8-010913
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300114
 CAS Sample ID: P1300114-008

Test Code:	EPA TO-15	Date Collected:	1/9/13
Instrument ID:	Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8	Date Received:	1/10/13
Analyst:	Karen Ryan	Date Analyzed:	1/16/13
Sample Type:	6.0 L Summa Canister	Volume(s) Analyzed:	1.00 Liter(s)
Test Notes:			
Container ID:	AC01868		

Initial Pressure (psig): -3.21 Final Pressure (psig): 3.61

Canister Dilution Factor: 1.59

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.80	ND	0.17	
127-18-4	Tetrachloroethene	0.19	0.16	0.028	0.023	
108-90-7	Chlorobenzene	ND	0.16	ND	0.035	
100-41-4	Ethylbenzene	ND	0.80	ND	0.18	
179601-23-1	m,p-Xylenes	1.2	0.80	0.27	0.18	
75-25-2	Bromoform	ND	0.80	ND	0.077	
100-42-5	Styrene	ND	0.80	ND	0.19	
95-47-6	o-Xylene	ND	0.80	ND	0.18	
111-84-2	n-Nonane	ND	0.80	ND	0.15	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.16	ND	0.023	
98-82-8	Cumene	ND	0.80	ND	0.16	
80-56-8	alpha-Pinene	2.0	0.80	0.35	0.14	
103-65-1	n-Propylbenzene	ND	0.80	ND	0.16	
622-96-8	4-Ethyltoluene	ND	0.80	ND	0.16	
108-67-8	1,3,5-Trimethylbenzene	ND	0.80	ND	0.16	
95-63-6	1,2,4-Trimethylbenzene	ND	0.80	ND	0.16	
100-44-7	Benzyl Chloride	ND	0.80	ND	0.15	
541-73-1	1,3-Dichlorobenzene	ND	0.16	ND	0.026	
106-46-7	1,4-Dichlorobenzene	ND	0.16	ND	0.026	
95-50-1	1,2-Dichlorobenzene	ND	0.16	ND	0.026	
5989-27-5	d-Limonene	ND	0.80	ND	0.14	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.80	ND	0.082	
120-82-1	1,2,4-Trichlorobenzene	ND	0.80	ND	0.11	
91-20-3	Naphthalene	ND	0.80	ND	0.15	
87-68-3	Hexachlorobutadiene	ND	0.80	ND	0.075	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C1-010913

CAS Project ID: P1300114

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1300114-009

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Karen Ryan

Date Analyzed: 1/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC00843

Initial Pressure (psig): -1.62 Final Pressure (psig): 3.61

Canister Dilution Factor: 1.40

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	1.5	0.70	0.84	0.41	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.2	0.70	0.44	0.14	
74-87-3	Chloromethane	0.57	0.28	0.28	0.14	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.70	ND	0.10	
75-01-4	Vinyl Chloride	ND	0.14	ND	0.055	
106-99-0	1,3-Butadiene	ND	0.28	ND	0.13	
74-83-9	Bromomethane	ND	0.14	ND	0.036	
75-00-3	Chloroethane	ND	0.14	ND	0.053	
64-17-5	Ethanol	7.4	7.0	3.9	3.7	
75-05-8	Acetonitrile	ND	0.70	ND	0.42	
107-02-8	Acrolein	ND	2.8	ND	1.2	
67-64-1	Acetone	8.3	7.0	3.5	2.9	
75-69-4	Trichlorofluoromethane	1.6	0.14	0.29	0.025	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	7.0	ND	2.8	
107-13-1	Acrylonitrile	ND	0.70	ND	0.32	
75-35-4	1,1-Dichloroethene	ND	0.14	ND	0.035	
75-09-2	Methylene Chloride	0.81	0.70	0.23	0.20	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.14	ND	0.045	
76-13-1	Trichlorotrifluoroethane	0.53	0.14	0.069	0.018	
75-15-0	Carbon Disulfide	ND	7.0	ND	2.2	
156-60-5	trans-1,2-Dichloroethene	ND	0.14	ND	0.035	
75-34-3	1,1-Dichloroethane	ND	0.14	ND	0.035	
1634-04-4	Methyl tert-Butyl Ether	ND	0.14	ND	0.039	
108-05-4	Vinyl Acetate	ND	7.0	ND	2.0	
78-93-3	2-Butanone (MEK)	ND	7.0	ND	2.4	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C1-010913

CAS Project ID: P1300114

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1300114-009

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Karen Ryan

Date Analyzed: 1/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC00843

Initial Pressure (psig): -1.62 Final Pressure (psig): 3.61

Canister Dilution Factor: 1.40

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.14	ND	0.035	
141-78-6	Ethyl Acetate	ND	1.4	ND	0.39	
110-54-3	n-Hexane	0.95	0.70	0.27	0.20	
67-66-3	Chloroform	0.19	0.14	0.040	0.029	
109-99-9	Tetrahydrofuran (THF)	ND	0.70	ND	0.24	
107-06-2	1,2-Dichloroethane	ND	0.14	ND	0.035	
71-55-6	1,1,1-Trichloroethane	ND	0.14	ND	0.026	
71-43-2	Benzene	3.7	0.14	1.2	0.044	
56-23-5	Carbon Tetrachloride	0.40	0.14	0.064	0.022	
110-82-7	Cyclohexane	ND	1.4	ND	0.41	
78-87-5	1,2-Dichloropropane	ND	0.14	ND	0.030	
75-27-4	Bromodichloromethane	ND	0.14	ND	0.021	
79-01-6	Trichloroethene	ND	0.14	ND	0.026	
123-91-1	1,4-Dioxane	ND	0.70	ND	0.19	
80-62-6	Methyl Methacrylate	ND	1.4	ND	0.34	
142-82-5	n-Heptane	ND	0.70	ND	0.17	
10061-01-5	cis-1,3-Dichloropropene	ND	0.70	ND	0.15	
108-10-1	4-Methyl-2-pentanone	ND	0.70	ND	0.17	
10061-02-6	trans-1,3-Dichloropropene	ND	0.70	ND	0.15	
79-00-5	1,1,2-Trichloroethane	ND	0.14	ND	0.026	
108-88-3	Toluene	3.0	0.70	0.81	0.19	
591-78-6	2-Hexanone	ND	0.70	ND	0.17	
124-48-1	Dibromochloromethane	ND	0.14	ND	0.016	
106-93-4	1,2-Dibromoethane	ND	0.14	ND	0.018	
123-86-4	n-Butyl Acetate	ND	0.70	ND	0.15	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-C1-010913
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300114
 CAS Sample ID: P1300114-009

Test Code:	EPA TO-15	Date Collected:	1/9/13
Instrument ID:	Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8	Date Received:	1/10/13
Analyst:	Karen Ryan	Date Analyzed:	1/16/13
Sample Type:	6.0 L Summa Canister	Volume(s) Analyzed:	1.00 Liter(s)
Test Notes:			
Container ID:	AC00843		

Initial Pressure (psig): -1.62 Final Pressure (psig): 3.61

Canister Dilution Factor: 1.40

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.70	ND	0.15	
127-18-4	Tetrachloroethene	0.18	0.14	0.027	0.021	
108-90-7	Chlorobenzene	0.43	0.14	0.094	0.030	
100-41-4	Ethylbenzene	ND	0.70	ND	0.16	
179601-23-1	m,p-Xylenes	1.3	0.70	0.30	0.16	
75-25-2	Bromoform	ND	0.70	ND	0.068	
100-42-5	Styrene	ND	0.70	ND	0.16	
95-47-6	o-Xylene	ND	0.70	ND	0.16	
111-84-2	n-Nonane	ND	0.70	ND	0.13	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.14	ND	0.020	
98-82-8	Cumene	ND	0.70	ND	0.14	
80-56-8	alpha-Pinene	1.9	0.70	0.33	0.13	
103-65-1	n-Propylbenzene	ND	0.70	ND	0.14	
622-96-8	4-Ethyltoluene	ND	0.70	ND	0.14	
108-67-8	1,3,5-Trimethylbenzene	ND	0.70	ND	0.14	
95-63-6	1,2,4-Trimethylbenzene	ND	0.70	ND	0.14	
100-44-7	Benzyl Chloride	ND	0.70	ND	0.14	
541-73-1	1,3-Dichlorobenzene	ND	0.14	ND	0.023	
106-46-7	1,4-Dichlorobenzene	ND	0.14	ND	0.023	
95-50-1	1,2-Dichlorobenzene	ND	0.14	ND	0.023	
5989-27-5	d-Limonene	ND	0.70	ND	0.13	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.70	ND	0.072	
120-82-1	1,2,4-Trichlorobenzene	ND	0.70	ND	0.094	
91-20-3	Naphthalene	ND	0.70	ND	0.13	
87-68-3	Hexachlorobutadiene	ND	0.70	ND	0.066	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C2-010913

CAS Project ID: P1300114

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1300114-010

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Karen Ryan

Date Analyzed: 1/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01028

Initial Pressure (psig): -1.93 Final Pressure (psig): 3.56

Canister Dilution Factor: 1.43

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	3.6	0.72	2.1	0.42	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.2	0.72	0.44	0.14	
74-87-3	Chloromethane	0.58	0.29	0.28	0.14	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.72	ND	0.10	
75-01-4	Vinyl Chloride	ND	0.14	ND	0.056	
106-99-0	1,3-Butadiene	ND	0.29	ND	0.13	
74-83-9	Bromomethane	ND	0.14	ND	0.037	
75-00-3	Chloroethane	ND	0.14	ND	0.054	
64-17-5	Ethanol	ND	7.2	ND	3.8	
75-05-8	Acetonitrile	ND	0.72	ND	0.43	
107-02-8	Acrolein	ND	2.9	ND	1.2	
67-64-1	Acetone	10	7.2	4.4	3.0	
75-69-4	Trichlorofluoromethane	1.6	0.14	0.28	0.025	
67-63-0	2-Propanol (Isopropyl Alcohol)	11	7.2	4.3	2.9	
107-13-1	Acrylonitrile	ND	0.72	ND	0.33	
75-35-4	1,1-Dichloroethene	ND	0.14	ND	0.036	
75-09-2	Methylene Chloride	0.86	0.72	0.25	0.21	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.14	ND	0.046	
76-13-1	Trichlorotrifluoroethane	0.53	0.14	0.069	0.019	
75-15-0	Carbon Disulfide	ND	7.2	ND	2.3	
156-60-5	trans-1,2-Dichloroethene	ND	0.14	ND	0.036	
75-34-3	1,1-Dichloroethane	ND	0.14	ND	0.035	
1634-04-4	Methyl tert-Butyl Ether	ND	0.14	ND	0.040	
108-05-4	Vinyl Acetate	ND	7.2	ND	2.0	
78-93-3	2-Butanone (MEK)	ND	7.2	ND	2.4	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 2 of 3

Client: CH2M Hill

Client Sample ID: PZAA-C2-010913

CAS Project ID: P1300114

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1300114-010

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Karen Ryan

Date Analyzed: 1/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01028

Initial Pressure (psig): -1.93 Final Pressure (psig): 3.56

Canister Dilution Factor: 1.43

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.14	ND	0.036	
141-78-6	Ethyl Acetate	ND	1.4	ND	0.40	
110-54-3	n-Hexane	0.97	0.72	0.28	0.20	
67-66-3	Chloroform	0.19	0.14	0.039	0.029	
109-99-9	Tetrahydrofuran (THF)	ND	0.72	ND	0.24	
107-06-2	1,2-Dichloroethane	ND	0.14	ND	0.035	
71-55-6	1,1,1-Trichloroethane	ND	0.14	ND	0.026	
71-43-2	Benzene	2.9	0.14	0.91	0.045	
56-23-5	Carbon Tetrachloride	0.32	0.14	0.051	0.023	
110-82-7	Cyclohexane	ND	1.4	ND	0.42	
78-87-5	1,2-Dichloropropane	ND	0.14	ND	0.031	
75-27-4	Bromodichloromethane	ND	0.14	ND	0.021	
79-01-6	Trichloroethene	ND	0.14	ND	0.027	
123-91-1	1,4-Dioxane	ND	0.72	ND	0.20	
80-62-6	Methyl Methacrylate	ND	1.4	ND	0.35	
142-82-5	n-Heptane	ND	0.72	ND	0.17	
10061-01-5	cis-1,3-Dichloropropene	ND	0.72	ND	0.16	
108-10-1	4-Methyl-2-pentanone	ND	0.72	ND	0.17	
10061-02-6	trans-1,3-Dichloropropene	ND	0.72	ND	0.16	
79-00-5	1,1,2-Trichloroethane	ND	0.14	ND	0.026	
108-88-3	Toluene	3.1	0.72	0.82	0.19	
591-78-6	2-Hexanone	ND	0.72	ND	0.17	
124-48-1	Dibromochloromethane	ND	0.14	ND	0.017	
106-93-4	1,2-Dibromoethane	ND	0.14	ND	0.019	
123-86-4	n-Butyl Acetate	ND	0.72	ND	0.15	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-C2-010913
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300114
 CAS Sample ID: P1300114-010

Test Code:	EPA TO-15	Date Collected:	1/9/13
Instrument ID:	Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8	Date Received:	1/10/13
Analyst:	Karen Ryan	Date Analyzed:	1/16/13
Sample Type:	6.0 L Summa Canister	Volume(s) Analyzed:	1.00 Liter(s)
Test Notes:			
Container ID:	AC01028		

Initial Pressure (psig): -1.93 Final Pressure (psig): 3.56

Canister Dilution Factor: 1.43

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.72	ND	0.15	
127-18-4	Tetrachloroethene	0.37	0.14	0.054	0.021	
108-90-7	Chlorobenzene	0.32	0.14	0.070	0.031	
100-41-4	Ethylbenzene	ND	0.72	ND	0.16	
179601-23-1	m,p-Xylenes	1.4	0.72	0.32	0.16	
75-25-2	Bromoform	ND	0.72	ND	0.069	
100-42-5	Styrene	ND	0.72	ND	0.17	
95-47-6	o-Xylene	ND	0.72	ND	0.16	
111-84-2	n-Nonane	ND	0.72	ND	0.14	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.14	ND	0.021	
98-82-8	Cumene	ND	0.72	ND	0.15	
80-56-8	alpha-Pinene	1.8	0.72	0.33	0.13	
103-65-1	n-Propylbenzene	ND	0.72	ND	0.15	
622-96-8	4-Ethyltoluene	ND	0.72	ND	0.15	
108-67-8	1,3,5-Trimethylbenzene	ND	0.72	ND	0.15	
95-63-6	1,2,4-Trimethylbenzene	ND	0.72	ND	0.15	
100-44-7	Benzyl Chloride	ND	0.72	ND	0.14	
541-73-1	1,3-Dichlorobenzene	ND	0.14	ND	0.024	
106-46-7	1,4-Dichlorobenzene	ND	0.14	ND	0.024	
95-50-1	1,2-Dichlorobenzene	ND	0.14	ND	0.024	
5989-27-5	d-Limonene	ND	0.72	ND	0.13	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.72	ND	0.074	
120-82-1	1,2,4-Trichlorobenzene	ND	0.72	ND	0.096	
91-20-3	Naphthalene	ND	0.72	ND	0.14	
87-68-3	Hexachlorobutadiene	ND	0.72	ND	0.067	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C3-010913

CAS Project ID: P1300114

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1300114-011

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Elsa Moctezuma

Date Analyzed: 1/17/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC00998

Initial Pressure (psig): -1.08 Final Pressure (psig): 3.52

Canister Dilution Factor: 1.34

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	1.5	0.67	0.86	0.39	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.1	0.67	0.42	0.14	
74-87-3	Chloromethane	0.56	0.27	0.27	0.13	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.67	ND	0.096	
75-01-4	Vinyl Chloride	ND	0.13	ND	0.052	
106-99-0	1,3-Butadiene	ND	0.27	ND	0.12	
74-83-9	Bromomethane	ND	0.13	ND	0.035	
75-00-3	Chloroethane	ND	0.13	ND	0.051	
64-17-5	Ethanol	ND	6.7	ND	3.6	
75-05-8	Acetonitrile	ND	0.67	ND	0.40	
107-02-8	Acrolein	ND	2.7	ND	1.2	
67-64-1	Acetone	7.5	6.7	3.2	2.8	
75-69-4	Trichlorofluoromethane	1.5	0.13	0.27	0.024	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	6.7	ND	2.7	
107-13-1	Acrylonitrile	ND	0.67	ND	0.31	
75-35-4	1,1-Dichloroethene	ND	0.13	ND	0.034	
75-09-2	Methylene Chloride	0.78	0.67	0.22	0.19	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.13	ND	0.043	
76-13-1	Trichlorotrifluoroethane	0.52	0.13	0.068	0.017	
75-15-0	Carbon Disulfide	ND	6.7	ND	2.2	
156-60-5	trans-1,2-Dichloroethene	ND	0.13	ND	0.034	
75-34-3	1,1-Dichloroethane	ND	0.13	ND	0.033	
1634-04-4	Methyl tert-Butyl Ether	ND	0.13	ND	0.037	
108-05-4	Vinyl Acetate	ND	6.7	ND	1.9	
78-93-3	2-Butanone (MEK)	ND	6.7	ND	2.3	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C3-010913

CAS Project ID: P1300114

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1300114-011

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Elsa Moctezuma

Date Analyzed: 1/17/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC00998

Initial Pressure (psig): -1.08 Final Pressure (psig): 3.52

Canister Dilution Factor: 1.34

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.13	ND	0.034	
141-78-6	Ethyl Acetate	ND	1.3	ND	0.37	
110-54-3	n-Hexane	0.91	0.67	0.26	0.19	
67-66-3	Chloroform	0.19	0.13	0.039	0.027	
109-99-9	Tetrahydrofuran (THF)	ND	0.67	ND	0.23	
107-06-2	1,2-Dichloroethane	ND	0.13	ND	0.033	
71-55-6	1,1,1-Trichloroethane	ND	0.13	ND	0.025	
71-43-2	Benzene	3.5	0.13	1.1	0.042	
56-23-5	Carbon Tetrachloride	0.42	0.13	0.067	0.021	
110-82-7	Cyclohexane	ND	1.3	ND	0.39	
78-87-5	1,2-Dichloropropane	ND	0.13	ND	0.029	
75-27-4	Bromodichloromethane	ND	0.13	ND	0.020	
79-01-6	Trichloroethene	ND	0.13	ND	0.025	
123-91-1	1,4-Dioxane	ND	0.67	ND	0.19	
80-62-6	Methyl Methacrylate	ND	1.3	ND	0.33	
142-82-5	n-Heptane	ND	0.67	ND	0.16	
10061-01-5	cis-1,3-Dichloropropene	ND	0.67	ND	0.15	
108-10-1	4-Methyl-2-pentanone	ND	0.67	ND	0.16	
10061-02-6	trans-1,3-Dichloropropene	ND	0.67	ND	0.15	
79-00-5	1,1,2-Trichloroethane	ND	0.13	ND	0.025	
108-88-3	Toluene	2.6	0.67	0.70	0.18	
591-78-6	2-Hexanone	ND	0.67	ND	0.16	
124-48-1	Dibromochloromethane	ND	0.13	ND	0.016	
106-93-4	1,2-Dibromoethane	ND	0.13	ND	0.017	
123-86-4	n-Butyl Acetate	ND	0.67	ND	0.14	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-C3-010913
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300114
 CAS Sample ID: P1300114-011

Test Code:	EPA TO-15	Date Collected:	1/9/13
Instrument ID:	Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8	Date Received:	1/10/13
Analyst:	Elsa Moctezuma	Date Analyzed:	1/17/13
Sample Type:	6.0 L Summa Canister	Volume(s) Analyzed:	1.00 Liter(s)
Test Notes:			
Container ID:	AC00998		

Initial Pressure (psig): -1.08 Final Pressure (psig): 3.52

Canister Dilution Factor: 1.34

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.67	ND	0.14	
127-18-4	Tetrachloroethene	0.18	0.13	0.026	0.020	
108-90-7	Chlorobenzene	0.43	0.13	0.093	0.029	
100-41-4	Ethylbenzene	ND	0.67	ND	0.15	
179601-23-1	m,p-Xylenes	1.2	0.67	0.27	0.15	
75-25-2	Bromoform	ND	0.67	ND	0.065	
100-42-5	Styrene	ND	0.67	ND	0.16	
95-47-6	o-Xylene	ND	0.67	ND	0.15	
111-84-2	n-Nonane	ND	0.67	ND	0.13	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.13	ND	0.020	
98-82-8	Cumene	ND	0.67	ND	0.14	
80-56-8	alpha-Pinene	1.7	0.67	0.31	0.12	
103-65-1	n-Propylbenzene	ND	0.67	ND	0.14	
622-96-8	4-Ethyltoluene	ND	0.67	ND	0.14	
108-67-8	1,3,5-Trimethylbenzene	ND	0.67	ND	0.14	
95-63-6	1,2,4-Trimethylbenzene	ND	0.67	ND	0.14	
100-44-7	Benzyl Chloride	ND	0.67	ND	0.13	
541-73-1	1,3-Dichlorobenzene	ND	0.13	ND	0.022	
106-46-7	1,4-Dichlorobenzene	ND	0.13	ND	0.022	
95-50-1	1,2-Dichlorobenzene	ND	0.13	ND	0.022	
5989-27-5	d-Limonene	ND	0.67	ND	0.12	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.67	ND	0.069	
120-82-1	1,2,4-Trichlorobenzene	ND	0.67	ND	0.090	
91-20-3	Naphthalene	ND	0.67	ND	0.13	
87-68-3	Hexachlorobutadiene	ND	0.67	ND	0.063	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C3-010913-D

CAS Project ID: P1300114

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1300114-012

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Elsa Moctezuma

Date Analyzed: 1/17/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:

Container ID: AC01908

Initial Pressure (psig): -1.73 Final Pressure (psig): 3.53

Canister Dilution Factor: 1.41

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	1.5	0.71	0.89	0.41	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.1	0.71	0.43	0.14	
74-87-3	Chloromethane	0.58	0.28	0.28	0.14	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.71	ND	0.10	
75-01-4	Vinyl Chloride	ND	0.14	ND	0.055	
106-99-0	1,3-Butadiene	ND	0.28	ND	0.13	
74-83-9	Bromomethane	ND	0.14	ND	0.036	
75-00-3	Chloroethane	ND	0.14	ND	0.053	
64-17-5	Ethanol	ND	7.1	ND	3.7	
75-05-8	Acetonitrile	ND	0.71	ND	0.42	
107-02-8	Acrolein	ND	2.8	ND	1.2	
67-64-1	Acetone	7.5	7.1	3.2	3.0	
75-69-4	Trichlorofluoromethane	1.6	0.14	0.29	0.025	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	7.1	ND	2.9	
107-13-1	Acrylonitrile	ND	0.71	ND	0.32	
75-35-4	1,1-Dichloroethene	ND	0.14	ND	0.036	
75-09-2	Methylene Chloride	0.83	0.71	0.24	0.20	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.14	ND	0.045	
76-13-1	Trichlorotrifluoroethane	0.53	0.14	0.069	0.018	
75-15-0	Carbon Disulfide	ND	7.1	ND	2.3	
156-60-5	trans-1,2-Dichloroethene	ND	0.14	ND	0.036	
75-34-3	1,1-Dichloroethane	ND	0.14	ND	0.035	
1634-04-4	Methyl tert-Butyl Ether	ND	0.14	ND	0.039	
108-05-4	Vinyl Acetate	ND	7.1	ND	2.0	
78-93-3	2-Butanone (MEK)	ND	7.1	ND	2.4	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C3-010913-D

CAS Project ID: P1300114

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1300114-012

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Elsa Moctezuma

Date Analyzed: 1/17/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01908

Initial Pressure (psig): -1.73 Final Pressure (psig): 3.53

Canister Dilution Factor: 1.41

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.14	ND	0.036	
141-78-6	Ethyl Acetate	ND	1.4	ND	0.39	
110-54-3	n-Hexane	0.96	0.71	0.27	0.20	
67-66-3	Chloroform	0.18	0.14	0.038	0.029	
109-99-9	Tetrahydrofuran (THF)	ND	0.71	ND	0.24	
107-06-2	1,2-Dichloroethane	ND	0.14	ND	0.035	
71-55-6	1,1,1-Trichloroethane	ND	0.14	ND	0.026	
71-43-2	Benzene	3.4	0.14	1.1	0.044	
56-23-5	Carbon Tetrachloride	0.49	0.14	0.078	0.022	
110-82-7	Cyclohexane	ND	1.4	ND	0.41	
78-87-5	1,2-Dichloropropane	ND	0.14	ND	0.031	
75-27-4	Bromodichloromethane	ND	0.14	ND	0.021	
79-01-6	Trichloroethene	ND	0.14	ND	0.026	
123-91-1	1,4-Dioxane	ND	0.71	ND	0.20	
80-62-6	Methyl Methacrylate	ND	1.4	ND	0.34	
142-82-5	n-Heptane	ND	0.71	ND	0.17	
10061-01-5	cis-1,3-Dichloropropene	ND	0.71	ND	0.16	
108-10-1	4-Methyl-2-pentanone	ND	0.71	ND	0.17	
10061-02-6	trans-1,3-Dichloropropene	ND	0.71	ND	0.16	
79-00-5	1,1,2-Trichloroethane	ND	0.14	ND	0.026	
108-88-3	Toluene	2.8	0.71	0.75	0.19	
591-78-6	2-Hexanone	ND	0.71	ND	0.17	
124-48-1	Dibromochloromethane	ND	0.14	ND	0.017	
106-93-4	1,2-Dibromoethane	ND	0.14	ND	0.018	
123-86-4	n-Butyl Acetate	ND	0.71	ND	0.15	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-C3-010913-D
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300114
 CAS Sample ID: P1300114-012

Test Code:	EPA TO-15	Date Collected:	1/9/13
Instrument ID:	Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8	Date Received:	1/10/13
Analyst:	Elsa Moctezuma	Date Analyzed:	1/17/13
Sample Type:	6.0 L Summa Canister	Volume(s) Analyzed:	1.00 Liter(s)
Test Notes:			
Container ID:	AC01908		

Initial Pressure (psig): -1.73 Final Pressure (psig): 3.53

Canister Dilution Factor: 1.41

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.71	ND	0.15	
127-18-4	Tetrachloroethene	0.19	0.14	0.028	0.021	
108-90-7	Chlorobenzene	0.40	0.14	0.087	0.031	
100-41-4	Ethylbenzene	ND	0.71	ND	0.16	
179601-23-1	m,p-Xylenes	1.2	0.71	0.29	0.16	
75-25-2	Bromoform	ND	0.71	ND	0.068	
100-42-5	Styrene	ND	0.71	ND	0.17	
95-47-6	o-Xylene	ND	0.71	ND	0.16	
111-84-2	n-Nonane	ND	0.71	ND	0.13	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.14	ND	0.021	
98-82-8	Cumene	ND	0.71	ND	0.14	
80-56-8	alpha-Pinene	1.8	0.71	0.32	0.13	
103-65-1	n-Propylbenzene	ND	0.71	ND	0.14	
622-96-8	4-Ethyltoluene	ND	0.71	ND	0.14	
108-67-8	1,3,5-Trimethylbenzene	ND	0.71	ND	0.14	
95-63-6	1,2,4-Trimethylbenzene	ND	0.71	ND	0.14	
100-44-7	Benzyl Chloride	ND	0.71	ND	0.14	
541-73-1	1,3-Dichlorobenzene	ND	0.14	ND	0.023	
106-46-7	1,4-Dichlorobenzene	ND	0.14	ND	0.023	
95-50-1	1,2-Dichlorobenzene	ND	0.14	ND	0.023	
5989-27-5	d-Limonene	ND	0.71	ND	0.13	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.71	ND	0.073	
120-82-1	1,2,4-Trichlorobenzene	ND	0.71	ND	0.095	
91-20-3	Naphthalene	ND	0.71	ND	0.13	
87-68-3	Hexachlorobutadiene	ND	0.71	ND	0.066	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 1 of 3

Client: CH2M Hill

Client Sample ID: PZAA-C4-010913

CAS Project ID: P1300114

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1300114-013

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Elsa Moctezuma

Date Analyzed: 1/17/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01131

Initial Pressure (psig): -2.53 Final Pressure (psig): 3.59

Canister Dilution Factor: 1.50

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	1.4	0.75	0.80	0.44	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.1	0.75	0.42	0.15	
74-87-3	Chloromethane	0.54	0.30	0.26	0.15	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.75	ND	0.11	
75-01-4	Vinyl Chloride	ND	0.15	ND	0.059	
106-99-0	1,3-Butadiene	ND	0.30	ND	0.14	
74-83-9	Bromomethane	ND	0.15	ND	0.039	
75-00-3	Chloroethane	ND	0.15	ND	0.057	
64-17-5	Ethanol	9.6	7.5	5.1	4.0	
75-05-8	Acetonitrile	ND	0.75	ND	0.45	
107-02-8	Acrolein	ND	3.0	ND	1.3	
67-64-1	Acetone	12	7.5	5.1	3.2	
75-69-4	Trichlorofluoromethane	1.5	0.15	0.27	0.027	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	7.5	ND	3.1	
107-13-1	Acrylonitrile	ND	0.75	ND	0.35	
75-35-4	1,1-Dichloroethene	ND	0.15	ND	0.038	
75-09-2	Methylene Chloride	0.83	0.75	0.24	0.22	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.15	ND	0.048	
76-13-1	Trichlorotrifluoroethane	0.53	0.15	0.070	0.020	
75-15-0	Carbon Disulfide	ND	7.5	ND	2.4	
156-60-5	trans-1,2-Dichloroethene	ND	0.15	ND	0.038	
75-34-3	1,1-Dichloroethane	ND	0.15	ND	0.037	
1634-04-4	Methyl tert-Butyl Ether	ND	0.15	ND	0.042	
108-05-4	Vinyl Acetate	ND	7.5	ND	2.1	
78-93-3	2-Butanone (MEK)	ND	7.5	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 2 of 3

Client: CH2M Hill

Client Sample ID: PZAA-C4-010913

CAS Project ID: P1300114

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1300114-013

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Elsa Moctezuma

Date Analyzed: 1/17/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01131

Initial Pressure (psig): -2.53 Final Pressure (psig): 3.59

Canister Dilution Factor: 1.50

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.15	ND	0.038	
141-78-6	Ethyl Acetate	ND	1.5	ND	0.42	
110-54-3	n-Hexane	0.96	0.75	0.27	0.21	
67-66-3	Chloroform	0.19	0.15	0.038	0.031	
109-99-9	Tetrahydrofuran (THF)	ND	0.75	ND	0.25	
107-06-2	1,2-Dichloroethane	ND	0.15	ND	0.037	
71-55-6	1,1,1-Trichloroethane	ND	0.15	ND	0.028	
71-43-2	Benzene	3.3	0.15	1.0	0.047	
56-23-5	Carbon Tetrachloride	0.41	0.15	0.066	0.024	
110-82-7	Cyclohexane	ND	1.5	ND	0.44	
78-87-5	1,2-Dichloropropane	ND	0.15	ND	0.032	
75-27-4	Bromodichloromethane	ND	0.15	ND	0.022	
79-01-6	Trichloroethene	ND	0.15	ND	0.028	
123-91-1	1,4-Dioxane	ND	0.75	ND	0.21	
80-62-6	Methyl Methacrylate	ND	1.5	ND	0.37	
142-82-5	n-Heptane	ND	0.75	ND	0.18	
10061-01-5	cis-1,3-Dichloropropene	ND	0.75	ND	0.17	
108-10-1	4-Methyl-2-pentanone	ND	0.75	ND	0.18	
10061-02-6	trans-1,3-Dichloropropene	ND	0.75	ND	0.17	
79-00-5	1,1,2-Trichloroethane	ND	0.15	ND	0.028	
108-88-3	Toluene	2.9	0.75	0.77	0.20	
591-78-6	2-Hexanone	ND	0.75	ND	0.18	
124-48-1	Dibromochloromethane	ND	0.15	ND	0.018	
106-93-4	1,2-Dibromoethane	ND	0.15	ND	0.020	
123-86-4	n-Butyl Acetate	ND	0.75	ND	0.16	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-C4-010913
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300114
 CAS Sample ID: P1300114-013

Test Code:	EPA TO-15	Date Collected:	1/9/13
Instrument ID:	Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8	Date Received:	1/10/13
Analyst:	Elsa Moctezuma	Date Analyzed:	1/17/13
Sample Type:	6.0 L Summa Canister	Volume(s) Analyzed:	1.00 Liter(s)
Test Notes:			
Container ID:	AC01131		

Initial Pressure (psig): -2.53 Final Pressure (psig): 3.59

Canister Dilution Factor: 1.50

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.75	ND	0.16	
127-18-4	Tetrachloroethene	0.20	0.15	0.030	0.022	
108-90-7	Chlorobenzene	0.31	0.15	0.067	0.033	
100-41-4	Ethylbenzene	ND	0.75	ND	0.17	
179601-23-1	m,p-Xylenes	1.3	0.75	0.31	0.17	
75-25-2	Bromoform	ND	0.75	ND	0.073	
100-42-5	Styrene	ND	0.75	ND	0.18	
95-47-6	o-Xylene	ND	0.75	ND	0.17	
111-84-2	n-Nonane	ND	0.75	ND	0.14	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.15	ND	0.022	
98-82-8	Cumene	ND	0.75	ND	0.15	
80-56-8	alpha-Pinene	1.7	0.75	0.31	0.13	
103-65-1	n-Propylbenzene	ND	0.75	ND	0.15	
622-96-8	4-Ethyltoluene	ND	0.75	ND	0.15	
108-67-8	1,3,5-Trimethylbenzene	ND	0.75	ND	0.15	
95-63-6	1,2,4-Trimethylbenzene	ND	0.75	ND	0.15	
100-44-7	Benzyl Chloride	ND	0.75	ND	0.14	
541-73-1	1,3-Dichlorobenzene	ND	0.15	ND	0.025	
106-46-7	1,4-Dichlorobenzene	ND	0.15	ND	0.025	
95-50-1	1,2-Dichlorobenzene	ND	0.15	ND	0.025	
5989-27-5	d-Limonene	ND	0.75	ND	0.13	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.75	ND	0.078	
120-82-1	1,2,4-Trichlorobenzene	ND	0.75	ND	0.10	
91-20-3	Naphthalene	ND	0.75	ND	0.14	
87-68-3	Hexachlorobutadiene	ND	0.75	ND	0.070	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-W1-010913

CAS Project ID: P1300114

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1300114-014

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Elsa Moctezuma

Date Analyzed: 1/17/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01188

Initial Pressure (psig): -1.82 Final Pressure (psig): 3.54

Canister Dilution Factor: 1.42

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	1.2	0.71	0.69	0.41	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.1	0.71	0.43	0.14	
74-87-3	Chloromethane	0.57	0.28	0.28	0.14	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.71	ND	0.10	
75-01-4	Vinyl Chloride	ND	0.14	ND	0.056	
106-99-0	1,3-Butadiene	ND	0.28	ND	0.13	
74-83-9	Bromomethane	ND	0.14	ND	0.037	
75-00-3	Chloroethane	ND	0.14	ND	0.054	
64-17-5	Ethanol	7.2	7.1	3.8	3.8	
75-05-8	Acetonitrile	ND	0.71	ND	0.42	
107-02-8	Acrolein	ND	2.8	ND	1.2	
67-64-1	Acetone	8.4	7.1	3.5	3.0	
75-69-4	Trichlorofluoromethane	1.5	0.14	0.27	0.025	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	7.1	ND	2.9	
107-13-1	Acrylonitrile	ND	0.71	ND	0.33	
75-35-4	1,1-Dichloroethene	ND	0.14	ND	0.036	
75-09-2	Methylene Chloride	0.81	0.71	0.23	0.20	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.14	ND	0.045	
76-13-1	Trichlorotrifluoroethane	0.53	0.14	0.069	0.019	
75-15-0	Carbon Disulfide	ND	7.1	ND	2.3	
156-60-5	trans-1,2-Dichloroethene	ND	0.14	ND	0.036	
75-34-3	1,1-Dichloroethane	ND	0.14	ND	0.035	
1634-04-4	Methyl tert-Butyl Ether	ND	0.14	ND	0.039	
108-05-4	Vinyl Acetate	ND	7.1	ND	2.0	
78-93-3	2-Butanone (MEK)	ND	7.1	ND	2.4	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 2 of 3

Client: CH2M Hill

Client Sample ID: PZAA-W1-010913

CAS Project ID: P1300114

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1300114-014

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Elsa Moctezuma

Date Analyzed: 1/17/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01188

Initial Pressure (psig): -1.82 Final Pressure (psig): 3.54

Canister Dilution Factor: 1.42

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.14	ND	0.036	
141-78-6	Ethyl Acetate	ND	1.4	ND	0.39	
110-54-3	n-Hexane	0.99	0.71	0.28	0.20	
67-66-3	Chloroform	0.20	0.14	0.041	0.029	
109-99-9	Tetrahydrofuran (THF)	ND	0.71	ND	0.24	
107-06-2	1,2-Dichloroethane	ND	0.14	ND	0.035	
71-55-6	1,1,1-Trichloroethane	ND	0.14	ND	0.026	
71-43-2	Benzene	2.9	0.14	0.89	0.044	
56-23-5	Carbon Tetrachloride	0.45	0.14	0.072	0.023	
110-82-7	Cyclohexane	ND	1.4	ND	0.41	
78-87-5	1,2-Dichloropropane	ND	0.14	ND	0.031	
75-27-4	Bromodichloromethane	ND	0.14	ND	0.021	
79-01-6	Trichloroethene	ND	0.14	ND	0.026	
123-91-1	1,4-Dioxane	ND	0.71	ND	0.20	
80-62-6	Methyl Methacrylate	ND	1.4	ND	0.35	
142-82-5	n-Heptane	ND	0.71	ND	0.17	
10061-01-5	cis-1,3-Dichloropropene	ND	0.71	ND	0.16	
108-10-1	4-Methyl-2-pentanone	ND	0.71	ND	0.17	
10061-02-6	trans-1,3-Dichloropropene	ND	0.71	ND	0.16	
79-00-5	1,1,2-Trichloroethane	ND	0.14	ND	0.026	
108-88-3	Toluene	2.8	0.71	0.73	0.19	
591-78-6	2-Hexanone	ND	0.71	ND	0.17	
124-48-1	Dibromochloromethane	ND	0.14	ND	0.017	
106-93-4	1,2-Dibromoethane	ND	0.14	ND	0.018	
123-86-4	n-Butyl Acetate	ND	0.71	ND	0.15	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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C
CH2M Hill
CAS Project ID: P1300114
Client Sample ID: PZAA-W1-010913
CAS Sample ID: P1300114-014
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

Test Code:	EPA TO-15	Date Collected:	1/9/13
Instrument ID:	Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8	Date Received:	1/10/13
Analyst:	Elsa Moctezuma	Date Analyzed:	1/17/13
Sample Type:	6.0 L Summa Canister	Volume(s) Analyzed:	1.00 Liter(s)
Test Notes:			
Container ID:	AC01188		

Initial Pressure (psig): -1.82 Final Pressure (psig): 3.54

Canister Dilution Factor: 1.42

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.71	ND	0.15	
127-18-4	Tetrachloroethene	0.18	0.14	0.026	0.021	
108-90-7	Chlorobenzene	0.50	0.14	0.11	0.031	
100-41-4	Ethylbenzene	ND	0.71	ND	0.16	
179601-23-1	m,p-Xylenes	1.3	0.71	0.29	0.16	
75-25-2	Bromoform	ND	0.71	ND	0.069	
100-42-5	Styrene	ND	0.71	ND	0.17	
95-47-6	o-Xylene	ND	0.71	ND	0.16	
111-84-2	n-Nonane	ND	0.71	ND	0.14	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.14	ND	0.021	
98-82-8	Cumene	ND	0.71	ND	0.14	
80-56-8	alpha-Pinene	1.7	0.71	0.30	0.13	
103-65-1	n-Propylbenzene	ND	0.71	ND	0.14	
622-96-8	4-Ethyltoluene	ND	0.71	ND	0.14	
108-67-8	1,3,5-Trimethylbenzene	ND	0.71	ND	0.14	
95-63-6	1,2,4-Trimethylbenzene	ND	0.71	ND	0.14	
100-44-7	Benzyl Chloride	ND	0.71	ND	0.14	
541-73-1	1,3-Dichlorobenzene	ND	0.14	ND	0.024	
106-46-7	1,4-Dichlorobenzene	ND	0.14	ND	0.024	
95-50-1	1,2-Dichlorobenzene	ND	0.14	ND	0.024	
5989-27-5	d-Limonene	ND	0.71	ND	0.13	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.71	ND	0.073	
120-82-1	1,2,4-Trichlorobenzene	ND	0.71	ND	0.096	
91-20-3	Naphthalene	ND	0.71	ND	0.14	
87-68-3	Hexachlorobutadiene	ND	0.71	ND	0.067	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-S1-010913

CAS Project ID: P1300114

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1300114-015

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Elsa Moctezuma

Date Analyzed: 1/17/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:

Container ID: AC00894

Initial Pressure (psig): -1.02 Final Pressure (psig): 3.54

Canister Dilution Factor: 1.33

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	1.2	0.67	0.71	0.39	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.1	0.67	0.43	0.13	
74-87-3	Chloromethane	0.53	0.27	0.26	0.13	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.67	ND	0.095	
75-01-4	Vinyl Chloride	ND	0.13	ND	0.052	
106-99-0	1,3-Butadiene	ND	0.27	ND	0.12	
74-83-9	Bromomethane	ND	0.13	ND	0.034	
75-00-3	Chloroethane	ND	0.13	ND	0.050	
64-17-5	Ethanol	ND	6.7	ND	3.5	
75-05-8	Acetonitrile	ND	0.67	ND	0.40	
107-02-8	Acrolein	ND	2.7	ND	1.2	
67-64-1	Acetone	9.9	6.7	4.2	2.8	
75-69-4	Trichlorofluoromethane	1.4	0.13	0.25	0.024	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	6.7	ND	2.7	
107-13-1	Acrylonitrile	ND	0.67	ND	0.31	
75-35-4	1,1-Dichloroethene	ND	0.13	ND	0.034	
75-09-2	Methylene Chloride	0.70	0.67	0.20	0.19	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.13	ND	0.043	
76-13-1	Trichlorotrifluoroethane	0.53	0.13	0.069	0.017	
75-15-0	Carbon Disulfide	ND	6.7	ND	2.1	
156-60-5	trans-1,2-Dichloroethene	ND	0.13	ND	0.034	
75-34-3	1,1-Dichloroethane	ND	0.13	ND	0.033	
1634-04-4	Methyl tert-Butyl Ether	ND	0.13	ND	0.037	
108-05-4	Vinyl Acetate	ND	6.7	ND	1.9	
78-93-3	2-Butanone (MEK)	ND	6.7	ND	2.3	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-S1-010913

CAS Project ID: P1300114

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1300114-015

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Elsa Moctezuma

Date Analyzed: 1/17/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC00894

Initial Pressure (psig): -1.02 Final Pressure (psig): 3.54

Canister Dilution Factor: 1.33

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.13	ND	0.034	
141-78-6	Ethyl Acetate	ND	1.3	ND	0.37	
110-54-3	n-Hexane	0.92	0.67	0.26	0.19	
67-66-3	Chloroform	0.21	0.13	0.044	0.027	
109-99-9	Tetrahydrofuran (THF)	ND	0.67	ND	0.23	
107-06-2	1,2-Dichloroethane	ND	0.13	ND	0.033	
71-55-6	1,1,1-Trichloroethane	ND	0.13	ND	0.024	
71-43-2	Benzene	2.5	0.13	0.78	0.042	
56-23-5	Carbon Tetrachloride	0.47	0.13	0.075	0.021	
110-82-7	Cyclohexane	ND	1.3	ND	0.39	
78-87-5	1,2-Dichloropropane	ND	0.13	ND	0.029	
75-27-4	Bromodichloromethane	ND	0.13	ND	0.020	
79-01-6	Trichloroethene	ND	0.13	ND	0.025	
123-91-1	1,4-Dioxane	ND	0.67	ND	0.18	
80-62-6	Methyl Methacrylate	ND	1.3	ND	0.32	
142-82-5	n-Heptane	ND	0.67	ND	0.16	
10061-01-5	cis-1,3-Dichloropropene	ND	0.67	ND	0.15	
108-10-1	4-Methyl-2-pentanone	ND	0.67	ND	0.16	
10061-02-6	trans-1,3-Dichloropropene	ND	0.67	ND	0.15	
79-00-5	1,1,2-Trichloroethane	ND	0.13	ND	0.024	
108-88-3	Toluene	2.6	0.67	0.68	0.18	
591-78-6	2-Hexanone	ND	0.67	ND	0.16	
124-48-1	Dibromochloromethane	ND	0.13	ND	0.016	
106-93-4	1,2-Dibromoethane	ND	0.13	ND	0.017	
123-86-4	n-Butyl Acetate	ND	0.67	ND	0.14	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-S1-010913
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300114
 CAS Sample ID: P1300114-015

Test Code:	EPA TO-15	Date Collected:	1/9/13
Instrument ID:	Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8	Date Received:	1/10/13
Analyst:	Elsa Moctezuma	Date Analyzed:	1/17/13
Sample Type:	6.0 L Summa Canister	Volume(s) Analyzed:	1.00 Liter(s)
Test Notes:			
Container ID:	AC00894		

Initial Pressure (psig): -1.02 Final Pressure (psig): 3.54

Canister Dilution Factor: 1.33

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.67	ND	0.14	
127-18-4	Tetrachloroethene	0.18	0.13	0.026	0.020	
108-90-7	Chlorobenzene	0.58	0.13	0.13	0.029	
100-41-4	Ethylbenzene	ND	0.67	ND	0.15	
179601-23-1	m,p-Xylenes	1.2	0.67	0.29	0.15	
75-25-2	Bromoform	ND	0.67	ND	0.064	
100-42-5	Styrene	ND	0.67	ND	0.16	
95-47-6	o-Xylene	ND	0.67	ND	0.15	
111-84-2	n-Nonane	ND	0.67	ND	0.13	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.13	ND	0.019	
98-82-8	Cumene	ND	0.67	ND	0.14	
80-56-8	alpha-Pinene	1.8	0.67	0.32	0.12	
103-65-1	n-Propylbenzene	ND	0.67	ND	0.14	
622-96-8	4-Ethyltoluene	ND	0.67	ND	0.14	
108-67-8	1,3,5-Trimethylbenzene	ND	0.67	ND	0.14	
95-63-6	1,2,4-Trimethylbenzene	ND	0.67	ND	0.14	
100-44-7	Benzyl Chloride	ND	0.67	ND	0.13	
541-73-1	1,3-Dichlorobenzene	ND	0.13	ND	0.022	
106-46-7	1,4-Dichlorobenzene	ND	0.13	ND	0.022	
95-50-1	1,2-Dichlorobenzene	ND	0.13	ND	0.022	
5989-27-5	d-Limonene	ND	0.67	ND	0.12	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.67	ND	0.069	
120-82-1	1,2,4-Trichlorobenzene	ND	0.67	ND	0.090	
91-20-3	Naphthalene	ND	0.67	ND	0.13	
87-68-3	Hexachlorobutadiene	ND	0.67	ND	0.062	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-N1-010913

CAS Project ID: P1300114

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1300114-017

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Elsa Moctezuma

Date Analyzed: 1/17/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:

Container ID: AC00789

Initial Pressure (psig): -1.55 Final Pressure (psig): 3.62

Canister Dilution Factor: 1.39

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	1.2	0.70	0.71	0.40	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.1	0.70	0.42	0.14	
74-87-3	Chloromethane	0.54	0.28	0.26	0.13	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.70	ND	0.099	
75-01-4	Vinyl Chloride	ND	0.14	ND	0.054	
106-99-0	1,3-Butadiene	ND	0.28	ND	0.13	
74-83-9	Bromomethane	ND	0.14	ND	0.036	
75-00-3	Chloroethane	ND	0.14	ND	0.053	
64-17-5	Ethanol	ND	7.0	ND	3.7	
75-05-8	Acetonitrile	ND	0.70	ND	0.41	
107-02-8	Acrolein	ND	2.8	ND	1.2	
67-64-1	Acetone	7.4	7.0	3.1	2.9	
75-69-4	Trichlorofluoromethane	1.3	0.14	0.24	0.025	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	7.0	ND	2.8	
107-13-1	Acrylonitrile	ND	0.70	ND	0.32	
75-35-4	1,1-Dichloroethene	ND	0.14	ND	0.035	
75-09-2	Methylene Chloride	ND	0.70	ND	0.20	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.14	ND	0.044	
76-13-1	Trichlorotrifluoroethane	0.52	0.14	0.068	0.018	
75-15-0	Carbon Disulfide	ND	7.0	ND	2.2	
156-60-5	trans-1,2-Dichloroethene	ND	0.14	ND	0.035	
75-34-3	1,1-Dichloroethane	ND	0.14	ND	0.034	
1634-04-4	Methyl tert-Butyl Ether	ND	0.14	ND	0.039	
108-05-4	Vinyl Acetate	ND	7.0	ND	2.0	
78-93-3	2-Butanone (MEK)	ND	7.0	ND	2.4	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-N1-010913

CAS Project ID: P1300114

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1300114-017

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Elsa Moctezuma

Date Analyzed: 1/17/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC00789

Initial Pressure (psig): -1.55 Final Pressure (psig): 3.62

Canister Dilution Factor: 1.39

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.14	ND	0.035	
141-78-6	Ethyl Acetate	ND	1.4	ND	0.39	
110-54-3	n-Hexane	0.89	0.70	0.25	0.20	
67-66-3	Chloroform	0.21	0.14	0.044	0.028	
109-99-9	Tetrahydrofuran (THF)	ND	0.70	ND	0.24	
107-06-2	1,2-Dichloroethane	ND	0.14	ND	0.034	
71-55-6	1,1,1-Trichloroethane	ND	0.14	ND	0.025	
71-43-2	Benzene	4.3	0.14	1.4	0.044	
56-23-5	Carbon Tetrachloride	0.46	0.14	0.073	0.022	
110-82-7	Cyclohexane	ND	1.4	ND	0.40	
78-87-5	1,2-Dichloropropane	ND	0.14	ND	0.030	
75-27-4	Bromodichloromethane	ND	0.14	ND	0.021	
79-01-6	Trichloroethene	ND	0.14	ND	0.026	
123-91-1	1,4-Dioxane	ND	0.70	ND	0.19	
80-62-6	Methyl Methacrylate	ND	1.4	ND	0.34	
142-82-5	n-Heptane	ND	0.70	ND	0.17	
10061-01-5	cis-1,3-Dichloropropene	ND	0.70	ND	0.15	
108-10-1	4-Methyl-2-pentanone	ND	0.70	ND	0.17	
10061-02-6	trans-1,3-Dichloropropene	ND	0.70	ND	0.15	
79-00-5	1,1,2-Trichloroethane	ND	0.14	ND	0.025	
108-88-3	Toluene	2.6	0.70	0.70	0.18	
591-78-6	2-Hexanone	ND	0.70	ND	0.17	
124-48-1	Dibromochloromethane	ND	0.14	ND	0.016	
106-93-4	1,2-Dibromoethane	ND	0.14	ND	0.018	
123-86-4	n-Butyl Acetate	ND	0.70	ND	0.15	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-N1-010913
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300114
CAS Sample ID: P1300114-017

Test Code:	EPA TO-15	Date Collected:	1/9/13
Instrument ID:	Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8	Date Received:	1/10/13
Analyst:	Elsa Moctezuma	Date Analyzed:	1/17/13
Sample Type:	6.0 L Summa Canister	Volume(s) Analyzed:	1.00 Liter(s)
Test Notes:			
Container ID:	AC00789		

Initial Pressure (psig): -1.55 Final Pressure (psig): 3.62

Canister Dilution Factor: 1.39

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.70	ND	0.15	
127-18-4	Tetrachloroethene	0.17	0.14	0.025	0.021	
108-90-7	Chlorobenzene	0.38	0.14	0.083	0.030	
100-41-4	Ethylbenzene	ND	0.70	ND	0.16	
179601-23-1	m,p-Xylenes	1.1	0.70	0.26	0.16	
75-25-2	Bromoform	ND	0.70	ND	0.067	
100-42-5	Styrene	ND	0.70	ND	0.16	
95-47-6	o-Xylene	ND	0.70	ND	0.16	
111-84-2	n-Nonane	ND	0.70	ND	0.13	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.14	ND	0.020	
98-82-8	Cumene	ND	0.70	ND	0.14	
80-56-8	alpha-Pinene	1.4	0.70	0.25	0.12	
103-65-1	n-Propylbenzene	ND	0.70	ND	0.14	
622-96-8	4-Ethyltoluene	ND	0.70	ND	0.14	
108-67-8	1,3,5-Trimethylbenzene	ND	0.70	ND	0.14	
95-63-6	1,2,4-Trimethylbenzene	ND	0.70	ND	0.14	
100-44-7	Benzyl Chloride	ND	0.70	ND	0.13	
541-73-1	1,3-Dichlorobenzene	ND	0.14	ND	0.023	
106-46-7	1,4-Dichlorobenzene	ND	0.14	ND	0.023	
95-50-1	1,2-Dichlorobenzene	ND	0.14	ND	0.023	
5989-27-5	d-Limonene	ND	0.70	ND	0.12	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.70	ND	0.072	
120-82-1	1,2,4-Trichlorobenzene	ND	0.70	ND	0.094	
91-20-3	Naphthalene	ND	0.70	ND	0.13	
87-68-3	Hexachlorobutadiene	ND	0.70	ND	0.065	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: Method Blank

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300114

CAS Sample ID: P130116-MB

Test Code: EPA TO-15

Date Collected: NA

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: NA

Analyst: Karen Ryan

Date Analyzed: 1/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:

Canister Dilution Factor: 1.00

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	ND	0.50	ND	0.29	
75-71-8	Dichlorodifluoromethane (CFC 12)	ND	0.50	ND	0.10	
74-87-3	Chloromethane	ND	0.20	ND	0.097	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.50	ND	0.072	
75-01-4	Vinyl Chloride	ND	0.10	ND	0.039	
106-99-0	1,3-Butadiene	ND	0.20	ND	0.090	
74-83-9	Bromomethane	ND	0.10	ND	0.026	
75-00-3	Chloroethane	ND	0.10	ND	0.038	
64-17-5	Ethanol	ND	5.0	ND	2.7	
75-05-8	Acetonitrile	ND	0.50	ND	0.30	
107-02-8	Acrolein	ND	2.0	ND	0.87	
67-64-1	Acetone	ND	5.0	ND	2.1	
75-69-4	Trichlorofluoromethane	ND	0.10	ND	0.018	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	5.0	ND	2.0	
107-13-1	Acrylonitrile	ND	0.50	ND	0.23	
75-35-4	1,1-Dichloroethene	ND	0.10	ND	0.025	
75-09-2	Methylene Chloride	ND	0.50	ND	0.14	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.10	ND	0.032	
76-13-1	Trichlorotrifluoroethane	ND	0.10	ND	0.013	
75-15-0	Carbon Disulfide	ND	5.0	ND	1.6	
156-60-5	trans-1,2-Dichloroethene	ND	0.10	ND	0.025	
75-34-3	1,1-Dichloroethane	ND	0.10	ND	0.025	
1634-04-4	Methyl tert-Butyl Ether	ND	0.10	ND	0.028	
108-05-4	Vinyl Acetate	ND	5.0	ND	1.4	
78-93-3	2-Butanone (MEK)	ND	5.0	ND	1.7	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: Method Blank
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300114
 CAS Sample ID: P130116-MB

Test Code: EPA TO-15
 Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8
 Analyst: Karen Ryan
 Sample Type: 6.0 L Summa Canister
 Test Notes:

Date Collected: NA
 Date Received: NA
 Date Analyzed: 1/16/13
 Volume(s) Analyzed: 1.00 Liter(s)

Canister Dilution Factor: 1.00

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.10	ND	0.025	
141-78-6	Ethyl Acetate	ND	1.0	ND	0.28	
110-54-3	n-Hexane	ND	0.50	ND	0.14	
67-66-3	Chloroform	ND	0.10	ND	0.020	
109-99-9	Tetrahydrofuran (THF)	ND	0.50	ND	0.17	
107-06-2	1,2-Dichloroethane	ND	0.10	ND	0.025	
71-55-6	1,1,1-Trichloroethane	ND	0.10	ND	0.018	
71-43-2	Benzene	ND	0.10	ND	0.031	
56-23-5	Carbon Tetrachloride	ND	0.10	ND	0.016	
110-82-7	Cyclohexane	ND	1.0	ND	0.29	
78-87-5	1,2-Dichloropropane	ND	0.10	ND	0.022	
75-27-4	Bromodichloromethane	ND	0.10	ND	0.015	
79-01-6	Trichloroethene	ND	0.10	ND	0.019	
123-91-1	1,4-Dioxane	ND	0.50	ND	0.14	
80-62-6	Methyl Methacrylate	ND	1.0	ND	0.24	
142-82-5	n-Heptane	ND	0.50	ND	0.12	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	ND	0.11	
108-10-1	4-Methyl-2-pentanone	ND	0.50	ND	0.12	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	ND	0.11	
79-00-5	1,1,2-Trichloroethane	ND	0.10	ND	0.018	
108-88-3	Toluene	ND	0.50	ND	0.13	
591-78-6	2-Hexanone	ND	0.50	ND	0.12	
124-48-1	Dibromochloromethane	ND	0.10	ND	0.012	
106-93-4	1,2-Dibromoethane	ND	0.10	ND	0.013	
123-86-4	n-Butyl Acetate	ND	0.50	ND	0.11	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: Method Blank
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300114
 CAS Sample ID: P130116-MB

Test Code:	EPA TO-15	Date Collected:	NA
Instrument ID:	Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8	Date Received:	NA
Analyst:	Karen Ryan	Date Analyzed:	1/16/13
Sample Type:	6.0 L Summa Canister	Volume(s) Analyzed:	1.00 Liter(s)
Test Notes:			

Canister Dilution Factor: 1.00

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.50	ND	0.11	
127-18-4	Tetrachloroethene	ND	0.10	ND	0.015	
108-90-7	Chlorobenzene	ND	0.10	ND	0.022	
100-41-4	Ethylbenzene	ND	0.50	ND	0.12	
179601-23-1	m,p-Xylenes	ND	0.50	ND	0.12	
75-25-2	Bromoform	ND	0.50	ND	0.048	
100-42-5	Styrene	ND	0.50	ND	0.12	
95-47-6	o-Xylene	ND	0.50	ND	0.12	
111-84-2	n-Nonane	ND	0.50	ND	0.095	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.10	ND	0.015	
98-82-8	Cumene	ND	0.50	ND	0.10	
80-56-8	alpha-Pinene	ND	0.50	ND	0.090	
103-65-1	n-Propylbenzene	ND	0.50	ND	0.10	
622-96-8	4-Ethyltoluene	ND	0.50	ND	0.10	
108-67-8	1,3,5-Trimethylbenzene	ND	0.50	ND	0.10	
95-63-6	1,2,4-Trimethylbenzene	ND	0.50	ND	0.10	
100-44-7	Benzyl Chloride	ND	0.50	ND	0.097	
541-73-1	1,3-Dichlorobenzene	ND	0.10	ND	0.017	
106-46-7	1,4-Dichlorobenzene	ND	0.10	ND	0.017	
95-50-1	1,2-Dichlorobenzene	ND	0.10	ND	0.017	
5989-27-5	d-Limonene	ND	0.50	ND	0.090	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.50	ND	0.052	
120-82-1	1,2,4-Trichlorobenzene	ND	0.50	ND	0.067	
91-20-3	Naphthalene	ND	0.50	ND	0.095	
87-68-3	Hexachlorobutadiene	ND	0.50	ND	0.047	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: Method Blank

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300114

CAS Sample ID: P130117-MB

Test Code: EPA TO-15

Date Collected: NA

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: NA

Analyst: Karen Ryan

Date Analyzed: 1/17/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:

Canister Dilution Factor: 1.00

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	ND	0.50	ND	0.29	
75-71-8	Dichlorodifluoromethane (CFC 12)	ND	0.50	ND	0.10	
74-87-3	Chloromethane	ND	0.20	ND	0.097	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.50	ND	0.072	
75-01-4	Vinyl Chloride	ND	0.10	ND	0.039	
106-99-0	1,3-Butadiene	ND	0.20	ND	0.090	
74-83-9	Bromomethane	ND	0.10	ND	0.026	
75-00-3	Chloroethane	ND	0.10	ND	0.038	
64-17-5	Ethanol	ND	5.0	ND	2.7	
75-05-8	Acetonitrile	ND	0.50	ND	0.30	
107-02-8	Acrolein	ND	2.0	ND	0.87	
67-64-1	Acetone	ND	5.0	ND	2.1	
75-69-4	Trichlorofluoromethane	ND	0.10	ND	0.018	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	5.0	ND	2.0	
107-13-1	Acrylonitrile	ND	0.50	ND	0.23	
75-35-4	1,1-Dichloroethene	ND	0.10	ND	0.025	
75-09-2	Methylene Chloride	ND	0.50	ND	0.14	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.10	ND	0.032	
76-13-1	Trichlorotrifluoroethane	ND	0.10	ND	0.013	
75-15-0	Carbon Disulfide	ND	5.0	ND	1.6	
156-60-5	trans-1,2-Dichloroethene	ND	0.10	ND	0.025	
75-34-3	1,1-Dichloroethane	ND	0.10	ND	0.025	
1634-04-4	Methyl tert-Butyl Ether	ND	0.10	ND	0.028	
108-05-4	Vinyl Acetate	ND	5.0	ND	1.4	
78-93-3	2-Butanone (MEK)	ND	5.0	ND	1.7	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 2 of 3

Client: CH2M Hill
Client Sample ID: Method Blank
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300114
 CAS Sample ID: P130117-MB

Test Code: EPA TO-15
 Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8
 Analyst: Karen Ryan
 Sample Type: 6.0 L Summa Canister
 Test Notes:

Date Collected: NA
 Date Received: NA
 Date Analyzed: 1/17/13
 Volume(s) Analyzed: 1.00 Liter(s)

Canister Dilution Factor: 1.00

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.10	ND	0.025	
141-78-6	Ethyl Acetate	ND	1.0	ND	0.28	
110-54-3	n-Hexane	ND	0.50	ND	0.14	
67-66-3	Chloroform	ND	0.10	ND	0.020	
109-99-9	Tetrahydrofuran (THF)	ND	0.50	ND	0.17	
107-06-2	1,2-Dichloroethane	ND	0.10	ND	0.025	
71-55-6	1,1,1-Trichloroethane	ND	0.10	ND	0.018	
71-43-2	Benzene	ND	0.10	ND	0.031	
56-23-5	Carbon Tetrachloride	ND	0.10	ND	0.016	
110-82-7	Cyclohexane	ND	1.0	ND	0.29	
78-87-5	1,2-Dichloropropane	ND	0.10	ND	0.022	
75-27-4	Bromodichloromethane	ND	0.10	ND	0.015	
79-01-6	Trichloroethene	ND	0.10	ND	0.019	
123-91-1	1,4-Dioxane	ND	0.50	ND	0.14	
80-62-6	Methyl Methacrylate	ND	1.0	ND	0.24	
142-82-5	n-Heptane	ND	0.50	ND	0.12	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	ND	0.11	
108-10-1	4-Methyl-2-pentanone	ND	0.50	ND	0.12	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	ND	0.11	
79-00-5	1,1,2-Trichloroethane	ND	0.10	ND	0.018	
108-88-3	Toluene	ND	0.50	ND	0.13	
591-78-6	2-Hexanone	ND	0.50	ND	0.12	
124-48-1	Dibromochloromethane	ND	0.10	ND	0.012	
106-93-4	1,2-Dibromoethane	ND	0.10	ND	0.013	
123-86-4	n-Butyl Acetate	ND	0.50	ND	0.11	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 3 of 3

Client: CH2M Hill
Client Sample ID: Method Blank
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300114
 CAS Sample ID: P130117-MB

Test Code: EPA TO-15 Date Collected: NA
 Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8 Date Received: NA
 Analyst: Karen Ryan Date Analyzed: 1/17/13
 Sample Type: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
 Test Notes:

Canister Dilution Factor: 1.00

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.50	ND	0.11	
127-18-4	Tetrachloroethene	ND	0.10	ND	0.015	
108-90-7	Chlorobenzene	ND	0.10	ND	0.022	
100-41-4	Ethylbenzene	ND	0.50	ND	0.12	
179601-23-1	m,p-Xylenes	ND	0.50	ND	0.12	
75-25-2	Bromoform	ND	0.50	ND	0.048	
100-42-5	Styrene	ND	0.50	ND	0.12	
95-47-6	o-Xylene	ND	0.50	ND	0.12	
111-84-2	n-Nonane	ND	0.50	ND	0.095	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.10	ND	0.015	
98-82-8	Cumene	ND	0.50	ND	0.10	
80-56-8	alpha-Pinene	ND	0.50	ND	0.090	
103-65-1	n-Propylbenzene	ND	0.50	ND	0.10	
622-96-8	4-Ethyltoluene	ND	0.50	ND	0.10	
108-67-8	1,3,5-Trimethylbenzene	ND	0.50	ND	0.10	
95-63-6	1,2,4-Trimethylbenzene	ND	0.50	ND	0.10	
100-44-7	Benzyl Chloride	ND	0.50	ND	0.097	
541-73-1	1,3-Dichlorobenzene	ND	0.10	ND	0.017	
106-46-7	1,4-Dichlorobenzene	ND	0.10	ND	0.017	
95-50-1	1,2-Dichlorobenzene	ND	0.10	ND	0.017	
5989-27-5	d-Limonene	ND	0.50	ND	0.090	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.50	ND	0.052	
120-82-1	1,2,4-Trichlorobenzene	ND	0.50	ND	0.067	
91-20-3	Naphthalene	ND	0.50	ND	0.095	
87-68-3	Hexachlorobutadiene	ND	0.50	ND	0.047	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

SURROGATE SPIKE RECOVERY RESULTS

Page 1 of 1

Client: CH2M Hill

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300114

Test Code: EPA TO-15

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date(s) Collected: 1/9/13

Analyst: Karen Ryan

Date(s) Received: 1/10/13

Sample Type: 6.0 L Summa Canister(s)

Date(s) Analyzed: 1/16 - 1/17/13

Test Notes:

Client Sample ID	CAS Sample ID	1,2-Dichloroethane-d4	Toluene-d8	Bromofluorobenzene	Acceptance Limits	Data Qualifier
		Percent Recovered	Percent Recovered	Percent Recovered		
Method Blank	P130116-MB	95	100	102	70-130	
Method Blank	P130117-MB	94	102	100	70-130	
Lab Control Sample	P130116-LCS	93	99	106	70-130	
Lab Control Sample	P130117-LCS	93	100	104	70-130	
PZAA-P1-010913	P1300114-001	95	100	102	70-130	
PZAA-P2-010913	P1300114-002	95	99	103	70-130	
PZAA-P3-010913	P1300114-003	95	101	101	70-130	
PZAA-P4-010913	P1300114-004	94	102	100	70-130	
PZAA-P5-010913	P1300114-005	95	100	99	70-130	
PZAA-P6-010913	P1300114-006	95	101	102	70-130	
PZAA-P7-010913	P1300114-007	95	101	102	70-130	
PZAA-P8-010913	P1300114-008	95	101	102	70-130	
PZAA-C1-010913	P1300114-009	95	102	101	70-130	
PZAA-C2-010913	P1300114-010	95	100	102	70-130	
PZAA-C3-010913	P1300114-011	94	99	102	70-130	
PZAA-C3-010913-D	P1300114-012	95	99	101	70-130	
PZAA-C3-010913-D	P1300114-012DUP	94	101	100	70-130	
PZAA-C4-010913	P1300114-013	93	100	105	70-130	
PZAA-W1-010913	P1300114-014	94	100	104	70-130	
PZAA-S1-010913	P1300114-015	94	100	103	70-130	
PZAA-N1-010913	P1300114-017	94	101	102	70-130	

Surrogate percent recovery is verified and accepted based on the on-column result.

Reported results are shown in concentration units and as a result of the calculation, may vary slightly from the on-column percent recovery.

LABORATORY CONTROL SAMPLE SUMMARY

Page 1 of 3

Client: CH2M Hill

Client Sample ID: Lab Control Sample

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300114

CAS Sample ID: P130116-LCS

Test Code: EPA TO-15

Date Collected: NA

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: NA

Analyst: Karen Ryan

Date Analyzed: 1/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 0.125 Liter(s)

Test Notes:

CAS #	Compound	Spike Amount µg/m³	Result µg/m³	% Recovery	CAS Acceptance Limits	Data Qualifier
115-07-1	Propene	204	192	94	59-137	
75-71-8	Dichlorodifluoromethane (CFC 12)	202	181	90	63-115	
74-87-3	Chloromethane	196	187	95	59-124	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	206	184	89	65-113	
75-01-4	Vinyl Chloride	200	187	94	59-121	
106-99-0	1,3-Butadiene	210	186	89	60-138	
74-83-9	Bromomethane	200	191	96	69-129	
75-00-3	Chloroethane	202	188	93	60-120	
64-17-5	Ethanol	958	917	96	58-121	
75-05-8	Acetonitrile	202	217	107	64-129	
107-02-8	Acrolein	204	198	97	54-127	
67-64-1	Acetone	1,040	981	94	59-114	
75-69-4	Trichlorofluoromethane	210	174	83	66-108	
67-63-0	2-Propanol (Isopropyl Alcohol)	396	360	91	50-113	
107-13-1	Acrylonitrile	206	209	101	72-135	
75-35-4	1,1-Dichloroethene	218	205	94	70-117	
75-09-2	Methylene Chloride	212	199	94	61-108	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	214	165	77	70-131	
76-13-1	Trichlorotrifluoroethane	212	202	95	70-113	
75-15-0	Carbon Disulfide	208	197	95	65-112	
156-60-5	trans-1,2-Dichloroethene	202	195	97	71-119	
75-34-3	1,1-Dichloroethane	206	186	90	71-116	
1634-04-4	Methyl tert-Butyl Ether	204	186	91	67-116	
108-05-4	Vinyl Acetate	988	1060	107	59-142	
78-93-3	2-Butanone (MEK)	212	183	86	68-125	

Laboratory Control Sample percent recovery is verified and accepted based on the on-column result.

Reported results are shown in concentration units and as a result of the calculation, may vary slightly.

LABORATORY CONTROL SAMPLE SUMMARY

Page 2 of 3

Client: CH2M Hill

Client Sample ID: Lab Control Sample

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300114

CAS Sample ID: P130116-LCS

Test Code: EPA TO-15

Date Collected: NA

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: NA

Analyst: Karen Ryan

Date Analyzed: 1/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 0.125 Liter(s)

Test Notes:

CAS #	Compound	Spike Amount µg/m³	Result µg/m³	% Recovery	CAS Acceptance Limits	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	214	192	90	69-119	
141-78-6	Ethyl Acetate	412	397	96	63-130	
110-54-3	n-Hexane	206	180	87	57-120	
67-66-3	Chloroform	222	190	86	69-111	
109-99-9	Tetrahydrofuran (THF)	208	202	97	57-123	
107-06-2	1,2-Dichloroethane	208	179	86	70-118	
71-55-6	1,1,1-Trichloroethane	204	187	92	73-119	
71-43-2	Benzene	208	185	89	66-121	
56-23-5	Carbon Tetrachloride	212	201	95	74-129	
110-82-7	Cyclohexane	402	370	92	70-113	
78-87-5	1,2-Dichloropropane	204	189	93	69-118	
75-27-4	Bromodichloromethane	204	195	96	75-124	
79-01-6	Trichloroethene	198	190	96	73-115	
123-91-1	1,4-Dioxane	206	214	104	71-123	
80-62-6	Methyl Methacrylate	414	410	99	72-127	
142-82-5	n-Heptane	202	186	92	68-120	
10061-01-5	cis-1,3-Dichloropropene	196	190	97	71-130	
108-10-1	4-Methyl-2-pentanone	210	210	100	69-130	
10061-02-6	trans-1,3-Dichloropropene	218	223	102	76-133	
79-00-5	1,1,2-Trichloroethane	202	193	96	73-120	
108-88-3	Toluene	208	183	88	67-111	
591-78-6	2-Hexanone	228	210	92	70-123	
124-48-1	Dibromochloromethane	216	215	100	75-129	
106-93-4	1,2-Dibromoethane	208	194	93	73-122	
123-86-4	n-Butyl Acetate	228	216	95	68-132	

Laboratory Control Sample percent recovery is verified and accepted based on the on-column result.
 Reported results are shown in concentration units and as a result of the calculation, may vary slightly.

LABORATORY CONTROL SAMPLE SUMMARY

Page 3 of 3

Client: CH2M Hill

Client Sample ID: Lab Control Sample

CAS Project ID: P1300114

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P130116-LCS

Test Code: EPA TO-15

Date Collected: NA

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: NA

Analyst: Karen Ryan

Date Analyzed: 1/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 0.125 Liter(s)

Test Notes:

CAS #	Compound	Spike Amount µg/m³	Result µg/m³	% Recovery	CAS Acceptance Limits	Data Qualifier
111-65-9	n-Octane	206	182	88	68-116	
127-18-4	Tetrachloroethene	190	167	88	67-119	
108-90-7	Chlorobenzene	208	188	90	69-113	
100-41-4	Ethylbenzene	206	182	88	71-117	
179601-23-1	m,p-Xylenes	412	350	85	70-116	
75-25-2	Bromoform	216	212	98	69-127	
100-42-5	Styrene	208	198	95	71-125	
95-47-6	o-Xylene	200	174	87	70-116	
111-84-2	n-Nonane	202	171	85	68-116	
79-34-5	1,1,2,2-Tetrachloroethane	198	188	95	70-119	
98-82-8	Cumene	196	172	88	70-116	
80-56-8	alpha-Pinene	192	175	91	71-119	
103-65-1	n-Propylbenzene	198	171	86	71-119	
622-96-8	4-Ethyltoluene	204	185	91	71-119	
108-67-8	1,3,5-Trimethylbenzene	208	188	90	71-121	
95-63-6	1,2,4-Trimethylbenzene	200	182	91	73-127	
100-44-7	Benzyl Chloride	206	217	105	65-137	
541-73-1	1,3-Dichlorobenzene	206	179	87	68-123	
106-46-7	1,4-Dichlorobenzene	212	176	83	65-120	
95-50-1	1,2-Dichlorobenzene	204	181	89	67-121	
5989-27-5	d-Limonene	206	200	97	67-130	
96-12-8	1,2-Dibromo-3-chloropropane	202	213	105	72-133	
120-82-1	1,2,4-Trichlorobenzene	200	212	106	62-133	
91-20-3	Naphthalene	178	192	108	56-138	
87-68-3	Hexachlorobutadiene	208	197	95	60-128	

Laboratory Control Sample percent recovery is verified and accepted based on the on-column result.
 Reported results are shown in concentration units and as a result of the calculation, may vary slightly.

LABORATORY CONTROL SAMPLE SUMMARY

Page 1 of 3

Client: CH2M Hill

Client Sample ID: Lab Control Sample

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300114

CAS Sample ID: P130117-LCS

Test Code: EPA TO-15

Date Collected: NA

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: NA

Analyst: Karen Ryan

Date Analyzed: 1/17/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 0.125 Liter(s)

Test Notes:

CAS #	Compound	Spike Amount µg/m³	Result µg/m³	% Recovery	CAS Acceptance Limits	Data Qualifier
115-07-1	Propene	204	192	94	59-137	
75-71-8	Dichlorodifluoromethane (CFC 12)	202	182	90	63-115	
74-87-3	Chloromethane	196	187	95	59-124	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	206	186	90	65-113	
75-01-4	Vinyl Chloride	200	188	94	59-121	
106-99-0	1,3-Butadiene	210	188	90	60-138	
74-83-9	Bromomethane	200	190	95	69-129	
75-00-3	Chloroethane	202	189	94	60-120	
64-17-5	Ethanol	958	920	96	58-121	
75-05-8	Acetonitrile	202	218	108	64-129	
107-02-8	Acrolein	204	198	97	54-127	
67-64-1	Acetone	1,040	985	95	59-114	
75-69-4	Trichlorofluoromethane	210	175	83	66-108	
67-63-0	2-Propanol (Isopropyl Alcohol)	396	374	94	50-113	
107-13-1	Acrylonitrile	206	212	103	72-135	
75-35-4	1,1-Dichloroethene	218	206	94	70-117	
75-09-2	Methylene Chloride	212	201	95	61-108	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	214	166	78	70-131	
76-13-1	Trichlorotrifluoroethane	212	203	96	70-113	
75-15-0	Carbon Disulfide	208	198	95	65-112	
156-60-5	trans-1,2-Dichloroethene	202	197	98	71-119	
75-34-3	1,1-Dichloroethane	206	188	91	71-116	
1634-04-4	Methyl tert-Butyl Ether	204	185	91	67-116	
108-05-4	Vinyl Acetate	988	1080	109	59-142	
78-93-3	2-Butanone (MEK)	212	184	87	68-125	

Laboratory Control Sample percent recovery is verified and accepted based on the on-column result.

Reported results are shown in concentration units and as a result of the calculation, may vary slightly.

LABORATORY CONTROL SAMPLE SUMMARY

Page 2 of 3

Client: CH2M Hill

Client Sample ID: Lab Control Sample

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300114

CAS Sample ID: P130117-LCS

Test Code: EPA TO-15

Date Collected: NA

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: NA

Analyst: Karen Ryan

Date Analyzed: 1/17/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 0.125 Liter(s)

Test Notes:

CAS #	Compound	Spike Amount µg/m³	Result µg/m³	% Recovery	CAS Acceptance Limits	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	214	194	91	69-119	
141-78-6	Ethyl Acetate	412	402	98	63-130	
110-54-3	n-Hexane	206	183	89	57-120	
67-66-3	Chloroform	222	191	86	69-111	
109-99-9	Tetrahydrofuran (THF)	208	205	99	57-123	
107-06-2	1,2-Dichloroethane	208	181	87	70-118	
71-55-6	1,1,1-Trichloroethane	204	189	93	73-119	
71-43-2	Benzene	208	187	90	66-121	
56-23-5	Carbon Tetrachloride	212	203	96	74-129	
110-82-7	Cyclohexane	402	373	93	70-113	
78-87-5	1,2-Dichloropropane	204	191	94	69-118	
75-27-4	Bromodichloromethane	204	196	96	75-124	
79-01-6	Trichloroethene	198	191	96	73-115	
123-91-1	1,4-Dioxane	206	215	104	71-123	
80-62-6	Methyl Methacrylate	414	414	100	72-127	
142-82-5	n-Heptane	202	187	93	68-120	
10061-01-5	cis-1,3-Dichloropropene	196	192	98	71-130	
108-10-1	4-Methyl-2-pentanone	210	213	101	69-130	
10061-02-6	trans-1,3-Dichloropropene	218	225	103	76-133	
79-00-5	1,1,2-Trichloroethane	202	194	96	73-120	
108-88-3	Toluene	208	186	89	67-111	
591-78-6	2-Hexanone	228	214	94	70-123	
124-48-1	Dibromochloromethane	216	220	102	75-129	
106-93-4	1,2-Dibromoethane	208	197	95	73-122	
123-86-4	n-Butyl Acetate	228	221	97	68-132	

Laboratory Control Sample percent recovery is verified and accepted based on the on-column result.
 Reported results are shown in concentration units and as a result of the calculation, may vary slightly.

LABORATORY CONTROL SAMPLE SUMMARY

Page 3 of 3

Client: CH2M Hill

Client Sample ID: Lab Control Sample

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300114

CAS Sample ID: P130117-LCS

Test Code: EPA TO-15

Date Collected: NA

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: NA

Analyst: Karen Ryan

Date Analyzed: 1/17/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 0.125 Liter(s)

Test Notes:

CAS #	Compound	Spike Amount µg/m³	Result µg/m³	% Recovery	CAS Acceptance Limits	Data Qualifier
111-65-9	n-Octane	206	186	90	68-116	
127-18-4	Tetrachloroethene	190	169	89	67-119	
108-90-7	Chlorobenzene	208	191	92	69-113	
100-41-4	Ethylbenzene	206	186	90	71-117	
179601-23-1	m,p-Xylenes	412	356	86	70-116	
75-25-2	Bromoform	216	217	100	69-127	
100-42-5	Styrene	208	202	97	71-125	
95-47-6	o-Xylene	200	177	89	70-116	
111-84-2	n-Nonane	202	179	89	68-116	
79-34-5	1,1,2,2-Tetrachloroethane	198	190	96	70-119	
98-82-8	Cumene	196	176	90	70-116	
80-56-8	alpha-Pinene	192	182	95	71-119	
103-65-1	n-Propylbenzene	198	177	89	71-119	
622-96-8	4-Ethyltoluene	204	190	93	71-119	
108-67-8	1,3,5-Trimethylbenzene	208	192	92	71-121	
95-63-6	1,2,4-Trimethylbenzene	200	188	94	73-127	
100-44-7	Benzyl Chloride	206	222	108	65-137	
541-73-1	1,3-Dichlorobenzene	206	182	88	68-123	
106-46-7	1,4-Dichlorobenzene	212	180	85	65-120	
95-50-1	1,2-Dichlorobenzene	204	185	91	67-121	
5989-27-5	d-Limonene	206	218	106	67-130	
96-12-8	1,2-Dibromo-3-chloropropane	202	218	108	72-133	
120-82-1	1,2,4-Trichlorobenzene	200	222	111	62-133	
91-20-3	Naphthalene	178	202	113	56-138	
87-68-3	Hexachlorobutadiene	208	209	100	60-128	

Laboratory Control Sample percent recovery is verified and accepted based on the on-column result.
 Reported results are shown in concentration units and as a result of the calculation, may vary slightly.

LABORATORY DUPLICATE SUMMARY RESULTS

Page 1 of 3

Client: CH2M Hill

Client Sample ID: PZAA-C3-010913-D

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300114

CAS Sample ID: P1300114-012DUP

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Elsa Moctezuma

Date Analyzed: 1/17/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:

Container ID: AC01908

Initial Pressure (psig): -1.73

Final Pressure (psig): 3.53

Canister Dilution Factor: 1.41

Compound	Sample Result		Duplicate Sample Result		Average	% RPD	RPD Limit	Data Qualifier
	µg/m³	ppbV	µg/m³	ppbV	µg/m³			
Propene	1.54	0.895	1.55	0.903	1.545	0.6	25	
Dichlorodifluoromethane (CFC 12)	2.13	0.431	2.11	0.427	2.12	0.9	25	
Chloromethane	0.578	0.280	0.464	0.225	0.521	22	25	
1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	ND	ND	ND	-	-	25	
Vinyl Chloride	ND	ND	ND	ND	-	-	25	
1,3-Butadiene	ND	ND	ND	ND	-	-	25	
Bromomethane	ND	ND	ND	ND	-	-	25	
Chloroethane	ND	ND	ND	ND	-	-	25	
Ethanol	ND	ND	ND	ND	-	-	25	
Acetonitrile	ND	ND	ND	ND	-	-	25	
Acrolein	ND	ND	ND	ND	-	-	25	
Acetone	7.53	3.17	7.55	3.18	7.54	0.3	25	
Trichlorofluoromethane	1.61	0.286	1.61	0.286	1.61	0	25	
2-Propanol (Isopropyl Alcohol)	ND	ND	ND	ND	-	-	25	
Acrylonitrile	ND	ND	ND	ND	-	-	25	
1,1-Dichloroethene	ND	ND	ND	ND	-	-	25	
Methylene Chloride	0.830	0.239	0.842	0.242	0.836	1	25	
3-Chloro-1-propene (Allyl Chloride)	ND	ND	ND	ND	-	-	25	
Trichlorotrifluoroethane	0.529	0.0690	0.525	0.0685	0.527	0.8	25	
Carbon Disulfide	ND	ND	ND	ND	-	-	25	
trans-1,2-Dichloroethene	ND	ND	ND	ND	-	-	25	
1,1-Dichloroethane	ND	ND	ND	ND	-	-	25	
Methyl tert-Butyl Ether	ND	ND	ND	ND	-	-	25	
Vinyl Acetate	ND	ND	ND	ND	-	-	25	
2-Butanone (MEK)	ND	ND	ND	ND	-	-	25	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

LABORATORY DUPLICATE SUMMARY RESULTS

Page 2 of 3

Client: CH2M Hill

Client Sample ID: PZAA-C3-010913-D

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300114

CAS Sample ID: P1300114-012DUP

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Elsa Moctezuma

Date Analyzed: 1/17/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:

Container ID: AC01908

Initial Pressure (psig): -1.73

Final Pressure (psig): 3.53

Canister Dilution Factor: 1.41

Compound	Sample Result		Duplicate Sample Result		Average	% RPD	RPD Limit	Data Qualifier
	µg/m³	ppbV	µg/m³	ppbV	µg/m³			
cis-1,2-Dichloroethene	ND	ND	ND	ND	-	-	25	
Ethyl Acetate	ND	ND	ND	ND	-	-	25	
n-Hexane	0.956	0.271	0.967	0.275	0.9615	1	25	
Chloroform	0.185	0.0378	0.190	0.0390	0.1875	3	25	
Tetrahydrofuran (THF)	ND	ND	ND	ND	-	-	25	
1,2-Dichloroethane	ND	ND	ND	ND	-	-	25	
1,1,1-Trichloroethane	ND	ND	ND	ND	-	-	25	
Benzene	3.41	1.07	3.44	1.08	3.425	0.9	25	
Carbon Tetrachloride	0.489	0.0778	0.479	0.0762	0.484	2	25	
Cyclohexane	ND	ND	ND	ND	-	-	25	
1,2-Dichloropropane	ND	ND	ND	ND	-	-	25	
Bromodichloromethane	ND	ND	ND	ND	-	-	25	
Trichloroethene	ND	ND	ND	ND	-	-	25	
1,4-Dioxane	ND	ND	ND	ND	-	-	25	
Methyl Methacrylate	ND	ND	ND	ND	-	-	25	
n-Heptane	ND	ND	ND	ND	-	-	25	
cis-1,3-Dichloropropene	ND	ND	ND	ND	-	-	25	
4-Methyl-2-pentanone	ND	ND	ND	ND	-	-	25	
trans-1,3-Dichloropropene	ND	ND	ND	ND	-	-	25	
1,1,2-Trichloroethane	ND	ND	ND	ND	-	-	25	
Toluene	2.81	0.745	2.86	0.758	2.835	2	25	
2-Hexanone	ND	ND	ND	ND	-	-	25	
Dibromochloromethane	ND	ND	ND	ND	-	-	25	
1,2-Dibromoethane	ND	ND	ND	ND	-	-	25	
n-Butyl Acetate	ND	ND	ND	ND	-	-	25	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

LABORATORY DUPLICATE SUMMARY RESULTS

Page 3 of 3

Client: CH2M Hill

Client Sample ID: PZAA-C3-010913-D

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300114

CAS Sample ID: P1300114-012DUP

Test Code: EPA TO-15

Date Collected: 1/9/13

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Date Received: 1/10/13

Analyst: Elsa Moctezuma

Date Analyzed: 1/17/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:

Container ID: AC01908

Initial Pressure (psig): -1.73

Final Pressure (psig): 3.53

Canister Dilution Factor: 1.41

Compound	Sample Result		Duplicate Sample Result		Average	% RPD	RPD Limit	Data Qualifier
	µg/m³	ppbV	µg/m³	ppbV	µg/m³			
n-Octane	ND	ND	ND	ND	-	-	25	
Tetrachloroethene	0.188	0.0277	0.196	0.0289	0.192	4	25	
Chlorobenzene	0.400	0.0870	0.407	0.0885	0.4035	2	25	
Ethylbenzene	ND	ND	ND	ND	-	-	25	
m,p-Xylenes	1.24	0.286	1.25	0.289	1.245	0.8	25	
Bromoform	ND	ND	ND	ND	-	-	25	
Styrene	ND	ND	ND	ND	-	-	25	
o-Xylene	ND	ND	ND	ND	-	-	25	
n-Nonane	ND	ND	ND	ND	-	-	25	
1,1,2,2-Tetrachloroethane	ND	ND	ND	ND	-	-	25	
Cumene	ND	ND	ND	ND	-	-	25	
alpha-Pinene	1.76	0.315	1.82	0.326	1.79	3	25	
n-Propylbenzene	ND	ND	ND	ND	-	-	25	
4-Ethyltoluene	ND	ND	ND	ND	-	-	25	
1,3,5-Trimethylbenzene	ND	ND	ND	ND	-	-	25	
1,2,4-Trimethylbenzene	ND	ND	ND	ND	-	-	25	
Benzyl Chloride	ND	ND	ND	ND	-	-	25	
1,3-Dichlorobenzene	ND	ND	ND	ND	-	-	25	
1,4-Dichlorobenzene	ND	ND	ND	ND	-	-	25	
1,2-Dichlorobenzene	ND	ND	ND	ND	-	-	25	
d-Limonene	ND	ND	ND	ND	-	-	25	
1,2-Dibromo-3-chloropropane	ND	ND	ND	ND	-	-	25	
1,2,4-Trichlorobenzene	ND	ND	ND	ND	-	-	25	
Naphthalene	ND	ND	ND	ND	-	-	25	
Hexachlorobutadiene	ND	ND	ND	ND	-	-	25	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300114

Method Blank Summary

Test Code: EPA TO-15
Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8 Lab File ID: 01161303.D
Analyst: Karen Ryan Date Analyzed: 1/16/13
Sample Type: 6.0 L Summa Canister(s) Time Analyzed: 10:09
Test Notes:

Client Sample ID	CAS Sample ID	Lab File ID	Time Analyzed
Lab Control Sample	P1300116-LCS	01161304.D	10:38
PZAA-P1-010913	P1300114-001	01161314.D	16:07
PZAA-P2-010913	P1300114-002	01161315.D	16:36
PZAA-P3-010913	P1300114-003	01161316.D	17:05
PZAA-P4-010913	P1300114-004	01161317.D	17:33
PZAA-P5-010913	P1300114-005	01161318.D	18:02
PZAA-P6-010913	P1300114-006	01161319.D	18:31
PZAA-P7-010913	P1300114-007	01161320.D	19:00
PZAA-P8-010913	P1300114-008	01161321.D	19:28
PZAA-C1-010913	P1300114-009	01161322.D	19:57
PZAA-C2-010913	P1300114-010	01161323.D	20:26

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1300114

Method Blank Summary

Test Code: EPA TO-15
Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8 Lab File ID: 01171303.D
Analyst: Karen Ryan Date Analyzed: 1/17/13
Sample Type: 6.0 L Summa Canister(s) Time Analyzed: 08:28
Test Notes:

Client Sample ID	CAS Sample ID	Lab File ID	Time Analyzed
PZAA-C3-010913	P1300114-011	01171304.D	09:52
PZAA-C3-010913-D	P1300114-012	01171305.D	10:21
PZAA-C3-010913-D (Lab Duplicate)	P1300114-012DUP	01171306.D	10:49
Lab Control Sample	P130117-LCS	01171307.D	11:18
PZAA-C4-010913	P1300114-013	01171314.D	15:13
PZAA-W1-010913	P1300114-014	01171315.D	15:42
PZAA-S1-010913	P1300114-015	01171316.D	16:11
PZAA-N1-010913	P1300114-017	01171317.D	16:39

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

CAS Project ID: P1300114

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

Internal Standard Area and RT Summary

Test Code: EPA TO-15

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Lab File ID: 01161301.D

Analyst: Karen Ryan

Date Analyzed: 1/16/13

Sample Type: 6.0 L Summa Canister(s)

Time Analyzed: 09:12

Test Notes:

	IS1 (BCM)		IS2 (DFB)		IS3 (CBZ)	
	AREA #	RT #	AREA #	RT #	AREA #	RT #
24 Hour Standard	153426	8.95	620109	10.99	292421	14.56
Upper Limit	214796	9.28	868153	11.32	409389	14.89
Lower Limit	92056	8.62	372065	10.66	175453	14.23

Client Sample ID

01	Method Blank	138882	8.93	590508	10.98	272683	14.57
02	Lab Control Sample	131852	8.95	541576	10.99	257254	14.57
03	PZAA-P1-010913	134032	8.93	569784	10.99	265055	14.57
04	PZAA-P2-010913	135500	8.93	568878	10.99	267604	14.57
05	PZAA-P3-010913	133955	8.93	566767	10.99	260236	14.56
06	PZAA-P4-010913	132404	8.93	559412	10.99	255396	14.57
07	PZAA-P5-010913	131982	8.93	564644	10.99	257635	14.56
08	PZAA-P6-010913	132597	8.93	559093	10.99	259575	14.56
09	PZAA-P7-010913	133238	8.93	564187	10.99	259682	14.57
10	PZAA-P8-010913	131717	8.93	560324	10.99	258230	14.56
11	PZAA-C1-010913	132139	8.93	558369	10.99	254921	14.57
12	PZAA-C2-010913	132639	8.93	563716	10.99	260938	14.57
13							
14							
15							
16							
17							
18							
19							
20							

IS1 (BCM) = Bromochloromethane

IS2 (DFB) = 1,4-Difluorobenzene

IS3 (CBZ) = Chlorobenzene-d5

AREA UPPER LIMIT = 140% of internal standard area

AREA LOWER LIMIT = 60% of internal standard area

RT UPPER LIMIT = 0.33 minutes of internal standard RT

RT LOWER LIMIT = 0.33 minutes of internal standard RT

Column used to flag values outside QC limits with an I.

I = Internal standard not within the specified limits.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

CAS Project ID: P1300114

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

Internal Standard Area and RT Summary

Test Code: EPA TO-15

Instrument ID: Tekmar AUTOCAN/Agilent 5973inert/6890N/MS8

Lab File ID: 01171301.D

Analyst: Karen Ryan

Date Analyzed: 1/17/13

Sample Type: 6.0 L Summa Canister(s)

Time Analyzed: 07:10

Test Notes:

	IS1 (BCM)		IS2 (DFB)		IS3 (CBZ)	
	AREA #	RT #	AREA #	RT #	AREA #	RT #
24 Hour Standard	142203	8.95	584683	10.99	271572	14.56
Upper Limit	199084	9.28	818556	11.32	380201	14.89
Lower Limit	85322	8.62	350810	10.66	162943	14.23

Client Sample ID

01	Method Blank	133737	8.93	569025	10.98	259537	14.57
02	PZAA-C3-010913	143905	8.93	599202	10.98	281560	14.56
03	PZAA-C3-010913-D	136050	8.93	572768	10.98	267605	14.56
04	PZAA-C3-010913-D (Lab Duplicate)	135257	8.93	564993	10.99	260935	14.57
05	Lab Control Sample	125821	8.95	517452	10.99	242498	14.56
06	PZAA-C4-010913	133653	8.93	562622	10.99	261784	14.56
07	PZAA-W1-010913	132382	8.93	560997	10.99	260798	14.56
08	PZAA-S1-010913	132966	8.93	563910	10.98	262348	14.57
09	PZAA-N1-010913	131964	8.93	557847	10.99	258143	14.56
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

IS1 (BCM) = Bromochloromethane

IS2 (DFB) = 1,4-Difluorobenzene

IS3 (CBZ) = Chlorobenzene-d5

AREA UPPER LIMIT = 140% of internal standard area

AREA LOWER LIMIT = 60% of internal standard area

RT UPPER LIMIT = 0.33 minutes of internal standard RT

RT LOWER LIMIT = 0.33 minutes of internal standard RT

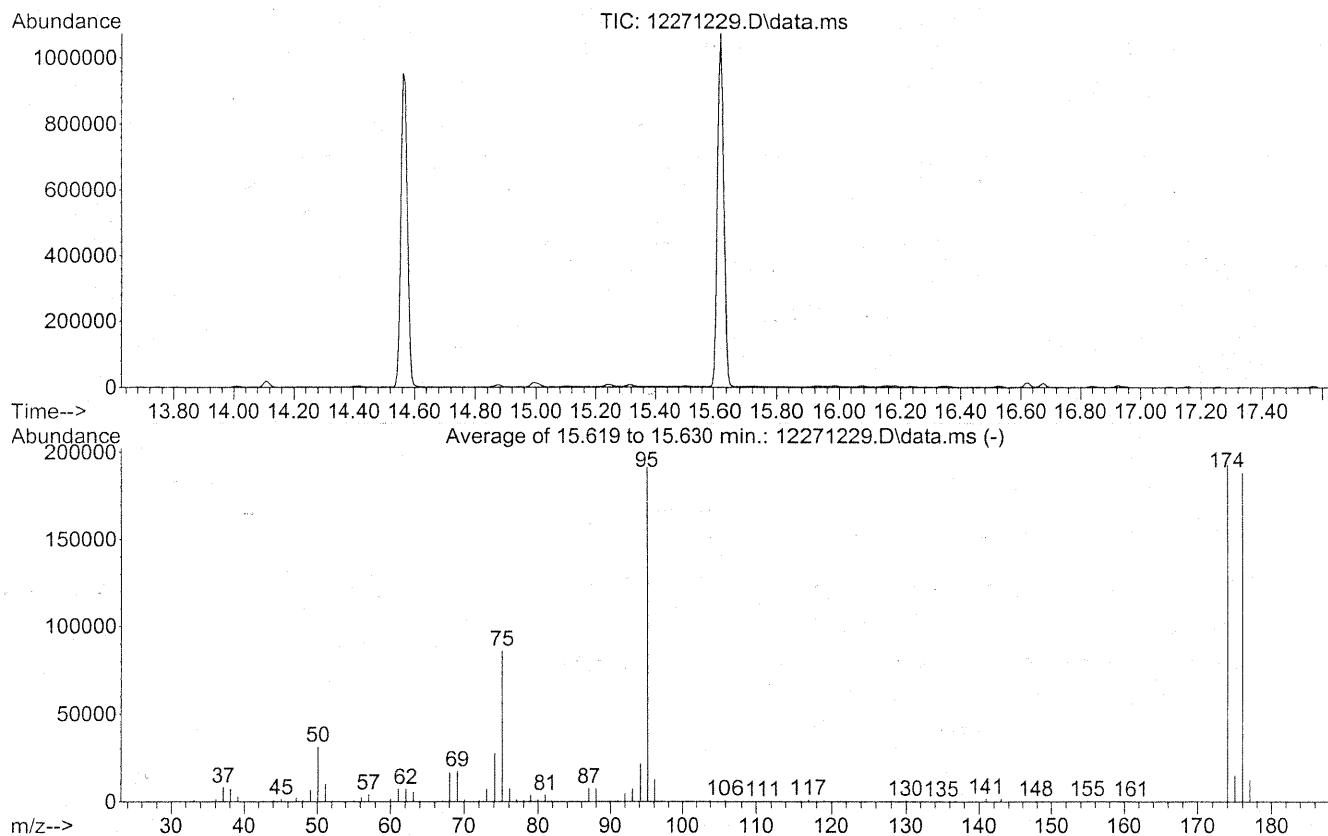
Column used to flag values outside QC limits with an I.

I = Internal standard not within the specified limits.

Data Path : I:\MS08\Data\2012_12\27\
 Data File : 12271229.D
 Acq On : 27 Dec 2012 23:02
 Operator : EM
 Sample : 12.5ng TO-15 BFB STD
 Misc : S25-12051201
 ALS Vial : 4 Sample Multiplier: 1

Integration File: RTEINT.P

Method : J:\MS08\Methods\R8122712.M
 Title : EPA TO-15 per SOP VOA-TO15 (CASS TO-15/GC-MS)
 Last Update : Fri Dec 28 09:39:24 2012



AutoFind: Scans 2628, 2629, 2630; Background Corrected with Scan 2621

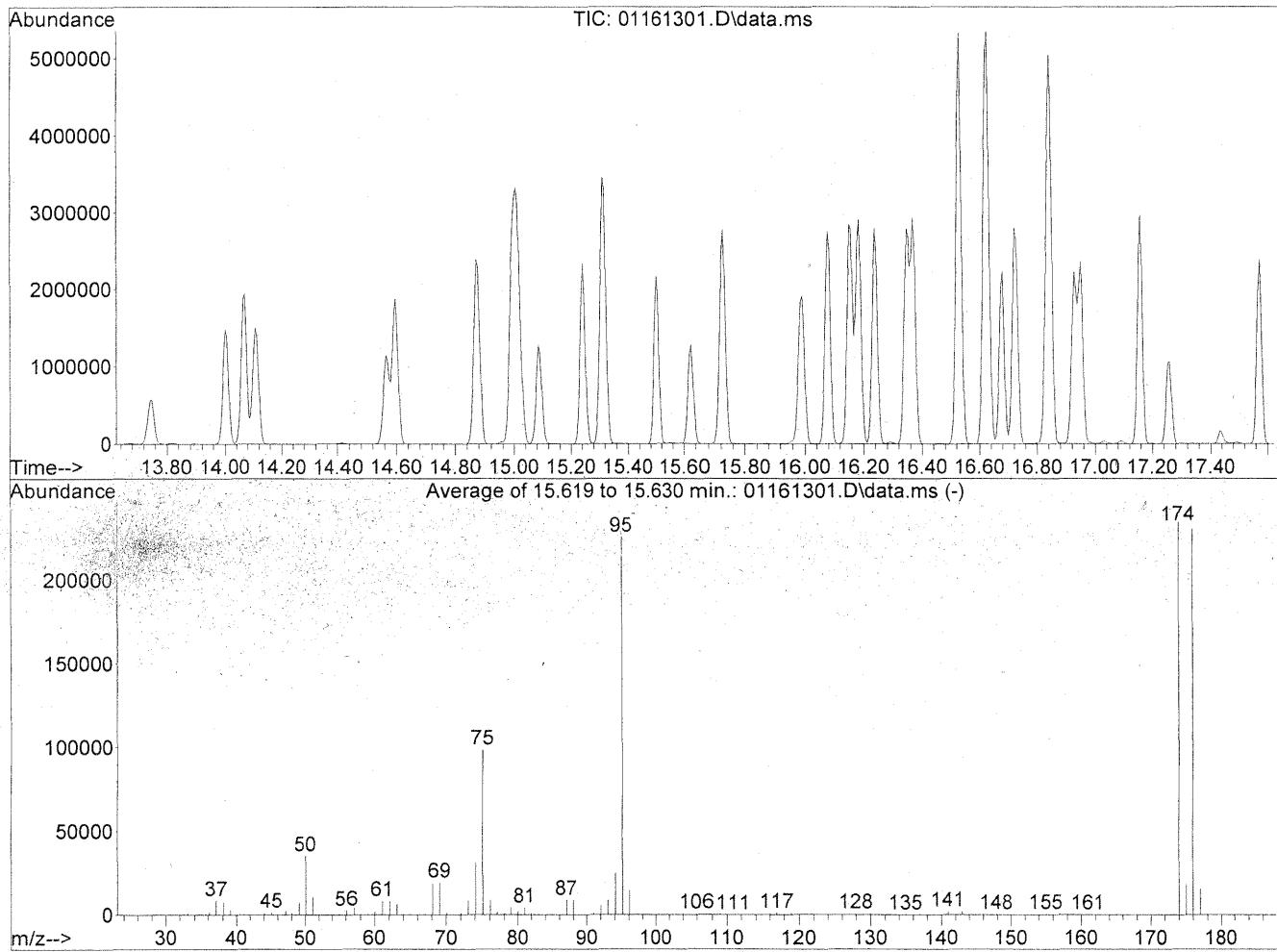
Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	8	40	16.3	31176	PASS
75	95	30	66	44.9	85907	PASS
95	95	100	100	100.0	191147	PASS
96	95	5	9	6.6	12561	PASS
173	174	0.00	2	0.0	0	PASS
174	95	50	120	100.8	192640	PASS
175	174	4	9	7.7	14845	PASS
176	174	93	101	97.6	187925	PASS
177	176	5	9	6.6	12394	PASS

EM 12/28/12

Data Path : I:\MS08\Data\2013_01\16\
 Data File : 01161301.D
 Acq On : 16 Jan 2013 9:12 am
 Operator : KR/WA
 Sample : 25ng TO-15 CCV STD (1/17)
 Misc : S25-01071301/S25-12191203
 ALS Vial : 14 Sample Multiplier: 1

Integration File: RTEINT.P

Method : J:\MS08\Methods\R8122712.M
 Title : EPA TO-15 per SOP VOA-TO15 (CASS TO-15/GC-MS)
 Last Update : Fri Dec 28 10:19:21 2012



AutoFind: Scans 2628, 2629, 2630; Background Corrected with Scan 2620

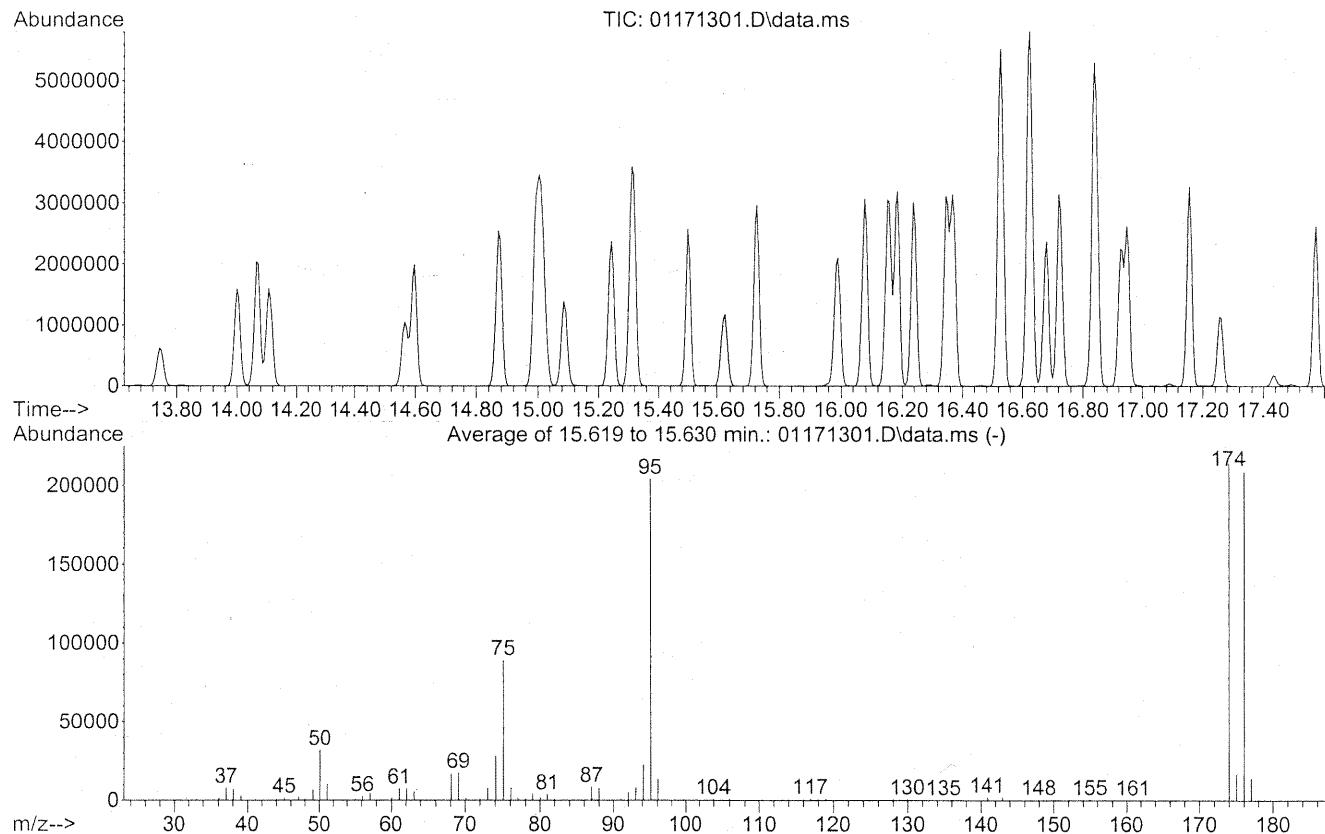
Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	8	40	15.6	35211	PASS
75	95	30	66	43.6	98613	PASS
95	95	100	100	100.0	226133	PASS
96	95	5	9	6.5	14807	PASS
173	174	0.00	2	0.0	0	PASS
174	95	50	120	103.9	235051	PASS
175	174	4	9	7.7	18121	PASS
176	174	93	101	98.2	230912	PASS
177	176	5	9	6.7	15423	PASS

4211613

Data Path : I:\MS08\Data\2013_01\17\
 Data File : 01171301.D
 Acq On : 17 Jan 2013 7:10
 Operator : KR/WA
 Sample : 25ng TO-15 CCV STD (1/17)
 Misc : S25-01071301/S25-12191203 (1/17)
 ALS Vial : 14 Sample Multiplier: 1

Integration File: RTEINT.P

Method : J:\MS08\Methods\R8122712.M
 Title : EPA TO-15 per SOP VOA-TO15 (CASS TO-15/GC-MS)
 Last Update : Fri Dec 28 10:19:21 2012



AutoFind: Scans 2628, 2629, 2630; Background Corrected with Scan 2620

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	8	40	15.7	31939	PASS
75	95	30	66	43.7	89179	PASS
95	95	100	100	100.0	204053	PASS
96	95	5	9	6.6	13424	PASS
173	174	0.00	2	0.0	0	PASS
174	95	50	120	105.0	214187	PASS
175	174	4	9	7.7	16583	PASS
176	174	93	101	97.5	208917	PASS
177	176	5	9	6.7	13985	PASS

en 1/17/13

Method Path : J:\MS08\Methods\
 Method File : R8122712.M
 Title : EPA TO-15 per SOP VOA-TO15 (CASS TO-15/GC-MS)
 Last Update : Fri Dec 28 10:19:21 2012
 Response Via : Initial Calibration

Calibration Files
 0.08=12271230.D 0.10=12271231.D 0.20=12271232.D 0.40=12271233.D 1.0 =12271234.D 5.0 =12271235.D
 25 =12271236.D 50 =12271237.D 100 =12271238.D

	Compound	0.08	0.10	0.20	0.40	1.0	5.0	25	50	100	Avg	%RSD
1)	IR	Bromochloromethane										
2)	T	Propene	2.092	1.831	1.493	1.567	1.428	1.435	1.625	1.260	1.146	1.542
3)	T	Dichlorodifluoromethane	3.230	2.892	2.634	2.599	2.572	2.154	2.337	1.942	1.789	2.461
4)	T	Chloromethane	2.390	2.033	1.798	1.804	1.793	1.535	1.708	1.439	1.294	1.755
5)	T	1,2-Dichloro-1...	1.746	1.611	1.433	1.405	1.358	1.136	1.274	1.047	0.970	1.331
6)	T	Vinyl Chloride	2.058	1.970	1.825	1.762	1.697	1.469	1.642	1.395	1.306	1.681
7)	T	1,3-Butadiene	1.994	1.800	1.455	1.491	1.428	1.182	1.342	1.092	1.011	1.422
8)	T	Bromomethane	1.267	1.240	1.138	1.089	1.051	0.892	1.012	0.896	0.838	1.047
9)	T	Chloroethane	1.169	1.018	0.909	0.937	0.948	0.781	0.867	0.756	0.708	0.899
10)	T	Ethanol	2.200	1.795	1.781	1.807	1.582	1.738	1.559	1.559	1.553	1.752
11)	T	Acetonitrile	0.730	0.713	0.629	0.543	0.624	0.553	0.553	0.520	0.616	12.05
12)	T	Acrolein										
13)	T	Acetone										
79 of 91	T	Trichlorofluoromethane	2.860	2.662	2.388	2.349	2.285	1.837	2.093	1.744	1.633	2.206
15)	T	2-Propanol (Is...)										
16)	T	Acrylonitrile	1.891	1.498	1.335	1.276	1.309	1.170	1.329	1.164	1.105	1.342
17)	T	1,1-Dichloroet...	1.367	1.253	1.133	1.156	1.155	0.978	1.088	0.939	0.883	1.106
18)	T	2-Methyl-1-2-Pro...										
19)	T	Methylene Chlo...										
20)	T	3-Chloro-1-pro...	2.937	2.778	2.566	2.379	2.158	1.685	1.799	1.539	1.441	2.142
21)	T	Trichlorotrifl...	1.283	1.252	1.150	1.165	1.165	1.155	0.948	1.078	0.885	1.094
22)	T	Carbon Disulfide										
23)	T	trans-1,2-Dich...	1.803	1.689	1.540	1.548	1.608	1.396	1.585	1.373	1.279	1.536
24)	T	1,1-Dichloroet...	2.711	2.520	2.224	2.096	2.122	1.794	1.969	1.706	1.588	2.081
25)	T	Methyl tert-Bu...	3.613	3.453	3.082	3.255	3.010	2.761	3.028	2.634	2.340	3.020
26)	T	Vinyl Acetate	0.310	0.287	0.270	0.312	0.276	0.276	0.322	0.284	0.264	0.288
27)	T	2-Butanone (MEK)	1.184	0.957	0.966	1.011	0.801	0.692	0.758	0.666	0.625	0.851
28)	T	cis-1,2-Dichlo...	1.963	1.859	1.601	1.630	1.548	1.328	1.465	1.270	1.185	1.539
29)	T	Diisopropyl Ether	1.108	1.030	0.986	1.097	1.221	1.040	1.147	0.989	0.911	1.059
30)	T	Ethyl Acetate	0.504	0.441	0.420	0.420	0.412	0.368	0.416	0.362	0.337	0.409
31)	T	n-Hexane	2.808	2.559	2.339	2.204	2.189	1.820	2.008	1.712	1.588	2.136
32)	T	Chloroform	2.614	2.337	2.052	2.008	1.990	1.666	1.833	1.575	1.443	1.946
33)	S	1,2-Dichloroet...	1.309	1.327	1.326	1.315	1.320	1.298	1.286	1.274	1.264	1.302
33)	T	Tetrahydrofura...	0.956	0.813	0.746	0.810	0.801	0.678	0.753	0.655	0.612	0.758
33)	T	Ethyl tert-But...	1.195	1.272	1.175	1.315	1.217	1.155	1.290	1.145	1.079	1.205
33)	T	1,2-Dichloroet...	2.022	1.866	1.583	1.592	1.550	1.306	1.448	1.240	1.138	1.527
37)	IR	1,4-Difluorobenzen...										
38)	T	1,1,1-Trichloro...	0.588	0.530	0.469	0.459	0.458	0.398	0.446	0.384	0.359	0.455

Page 37
 37) IR 1,4-Difluorobenzen...-----ISTD-----
 38) T 1,1,1-Trichloro...-----ISTD-----

Method Path : J:\MS08\Methods\

Title : EPA TO-15 per SOP VOA-T015 (CASS TO-15/GC-MS)

39) T	Isopropyl Acetate	0.209	0.199	0.170	0.174	0.171	0.152	0.169	0.134	0.146	0.169
40) T	1-Butanol			0.275	0.275	0.275	0.256	0.246	0.297	0.261	0.268
41) T	Benzene	1.707	1.586	1.352	0.408	0.491	0.483	0.477	0.409	0.453	0.354
42) T	Carbon Tetrachloride	0.611	0.563	0.611	0.728	0.775	0.728	0.709	0.635	0.623	0.470
43) T	Cyclohexane	0.775	0.728	0.775	0.728	0.728	0.728	0.728	0.704	0.631	0.611
44) T	tert-Amyl Methylethane	0.349	0.329	0.291	0.291	0.289	0.282	0.282	0.243	0.268	0.233
45) T	1,2-Dichloropropane	0.451	0.415	0.451	0.411	0.411	0.374	0.364	0.366	0.370	0.324
46) T	Bromodichloromethane	0.447	0.411	0.447	0.411	0.371	0.348	0.348	0.350	0.298	0.289
47) T	Trichloroethene	0.291	0.240	0.291	0.240	0.222	0.225	0.225	0.233	0.205	0.206
48) T	1,4-Dioxane	2,2,4-Trimethylpentane	1.671	1.537	1.671	1.537	1.347	1.347	1.323	1.086	1.206
49) T	Methyl Methacrylate	0.172	0.140	0.172	0.140	0.128	0.128	0.131	0.129	0.118	0.133
50) T	n-Heptane	0.410	0.384	0.410	0.384	0.329	0.329	0.323	0.323	0.272	0.302
51) T	cis-1,3-Dichloro-2-pentene	0.566	0.496	0.566	0.496	0.432	0.432	0.435	0.439	0.389	0.445
52) T	4-Methyl-1-2-pentene	0.299	0.281	0.299	0.281	0.264	0.264	0.275	0.261	0.232	0.264
53) T	trans-1,3-Dichloro-2-pentene	0.447	0.409	0.447	0.409	0.371	0.378	0.378	0.371	0.348	0.404
54) T	1,1,2-Trichloroethane	0.355	0.311	0.355	0.311	0.281	0.281	0.290	0.279	0.244	0.274
55) T											
56) IR	Toluene-d5	(2.234	2.225	2.212	2.212	2.247	2.215	2.232	2.228	2.235	2.235
57) S	Toluene-d8 (SS2)	3.845	3.444	2.807	2.740	2.587	2.201	2.461	2.133	1.950	2.685
58) T	Toluene	1.910	1.589	1.359	1.359	1.236	1.095	1.229	1.061	0.970	1.313
59) T	2-Hexanone	0.804	0.735	0.618	0.618	0.646	0.593	0.691	0.608	0.572	0.658
60) T	Dibromochloromethane	0.901	0.804	0.675	0.675	0.691	0.659	0.589	0.668	0.589	0.551
61) T	1,2-Dibromoethane	2.199	1.831	1.549	1.549	1.464	1.317	1.517	1.304	1.184	1.546
62) T	n-Butyl Acetate	0.716	0.672	0.583	0.583	0.585	0.572	0.485	0.532	0.460	0.423
63) T	n-Octane	1.325	1.155	0.996	0.996	0.988	0.907	0.766	0.860	0.756	0.701
64) T	Tetrachloroethene	2.395	2.163	1.802	1.802	1.818	1.729	1.463	1.631	1.415	1.746
65) T	Chlorobenzene	4.229	3.680	3.060	3.060	3.046	2.950	2.510	2.793	2.422	2.180
66) T	Ethylbenzene	3.515	3.028	2.538	2.538	2.518	2.377	2.021	2.259	1.937	1.683
67) T	m- & p-Xylenes	0.709	0.627	0.554	0.554	0.587	0.591	0.544	0.662	0.578	0.525
68) T	Bromoform	2.436	2.070	1.729	1.729	1.746	1.552	1.789	1.565	1.424	1.782
69) T	Styrene	3.423	3.012	2.568	2.568	2.553	2.426	2.057	2.292	1.972	1.737
70) T	o-Xylene	1.642	1.542	1.389	1.389	1.361	1.347	1.127	1.239	1.043	0.923
71) T	n-Nonane	1.236	1.184	1.039	1.039	1.055	1.047	0.917	1.045	0.911	0.809
72) T	1,1,2,2-Tetrachloroethane	1.140	1.130	1.126	1.126	1.132	1.121	1.125	1.149	1.155	1.163
73) S	Bromofluorobenzene	4.726	3.852	3.276	3.276	3.294	3.165	2.739	3.053	2.606	2.301
74) T	Cumene	1.572	1.557	1.348	1.348	1.390	1.427	1.217	1.480	1.286	1.390
75) T	alpha-Pinene	5.228	4.627	3.832	3.832	3.818	3.712	3.194	3.547	3.041	2.664
76) T	n-Propylbenzene	4.331	3.878	3.216	3.234	3.119	2.642	3.170	2.576	2.301	3.740
77) T	3-Ethyltoluene	3.927	3.406	2.954	2.954	2.968	2.813	2.466	2.568	2.347	2.052
78) T	4-Ethyltoluene	3.380	2.942	2.458	2.458	2.492	2.404	2.081	2.347	2.012	1.800
79) T	1,3,5-Trimethylbenzene	1.476	1.233	1.061	1.061	1.052	1.333	1.197	1.404	1.208	1.060
80) T	alpha-Methylstyrene	4.174	3.692	3.168	3.168	3.169	3.052	2.602	2.925	2.503	2.208
81) T	2-Ethyltoluene	3.467	2.970	2.522	2.522	2.556	2.135	2.406	2.018	1.731	2.474
82) T	1,2,4-Trimethylbenzene	1.738	1.539	1.305	1.305	1.342	1.283	1.122	1.248	1.022	0.787
83) T	n-Decane	2.250	1.817	1.554	1.554	1.597	1.660	2.025	1.723	1.448	1.752
84) T	Benzyl Chloride	2.407	1.985	1.578	1.578	1.461	1.277	1.415	1.167	0.989	1.537
85) T	1,3-Dichlorobenzene	2.663	2.193	1.625	1.625	1.570	1.470	1.283	1.462	1.159	1.634
86) T	1,4-Dichlorobenzene										

Method Path : J:\MS08\Methods\

Method File : R8122712.M

Title	File	Method	Path	Instrument	MS	GC-MS	TO-15/GC-MS	CASS	VOA-TO15	VOA	SOP	TO-15	(CASS)	(GC-MS)
87) T	sec-Butylbenzene	4.288	3.903	3.402	3.406	3.260	2.854	3.198	2.732	2.384	3.270	17.85		
88) T	4-Isopropyltol...	4.398	4.110	3.569	3.542	3.482	3.032	3.386	2.760	2.250	3.392	19.28		
89) T	1, 2, 3-Trimethyl...	3.300	3.071	2.592	2.606	2.499	2.178	2.460	2.067	1.761	2.504	19.08		
90) T	1, 2-Dichloroben...	2.193	1.819	1.497	1.491	1.435	1.237	1.408	1.219	1.077	1.486	22.81		
91) T	d-Limonene	0.793	0.750	0.605	0.605	0.662	0.813	0.724	0.843	0.735	0.667	0.732	10.62	
92) T	1, 2-Dibromo-3-...	0.611	0.554	0.474	0.514	0.485	0.472	0.556	0.493	0.459	0.513	9.85		
93) T	n-Undecane	1.609	1.501	1.196	1.190	1.117	0.995	1.207	1.047	0.921	1.198	18.85		
94) T	1, 2, 4-Trichlor...				1.126	1.000	0.936	1.110	0.987	0.894	1.009	9.20		
95) T	Naphthalene				3.398	2.926	2.844	3.521	3.131	2.739	3.093	10.16		
96) T	n-Dodecane				1.237	1.255	1.055	0.909	1.118	0.940	0.806	1.046	16.24	
97) T	Hexachlorobuta...	0.841	0.811	0.731	0.727	0.683	0.618	0.706	0.622	0.562	0.700	12.99		
98) T	Cyclohexanone	1.185	1.029	0.873	0.892	0.797	0.719	0.865	0.761	0.703	0.869	17.86		
99) T	tert-Butylbenzene	3.321	3.152	2.652	2.656	2.534	2.201	2.461	2.041	1.742	2.529	19.85		
100) T	n-Butylbenzene	3.137	2.915	2.464	2.440	2.382	2.122	2.411	2.053	1.798	2.413	17.16		

(#) = Out of Range

Evaluate Continuing Calibration Report

Data Path : I:\MS08\Data\2013_01\16\
 Data File : 01161301.D
 Acq On : 16 Jan 2013 9:12 am
 Operator : KR/WA
 Sample : 25ng TO-15 CCV STD (1/17)
 Misc : S25-01071301/S25-12191203
 ALS Vial : 14 Sample Multiplier: 1

Quant Time: Jan 16 10:31:01 2013
 Quant Method : J:\MS08\Methods\R8122712.M
 Quant Title : EPA TO-15 per SOP VOA-TO15 (CASS TO-15/GC-MS)
 QLast Update : Fri Dec 28 10:19:21 2012
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 200%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	IR Bromochloromethane (IS1)	1.000	1.000	0.0	117	-0.02
2	T Propene	1.542	1.335	13.4	96	-0.01
3	T Dichlorodifluoromethane (CF	2.461	2.079	15.5	104	-0.01
4	T Chloromethane	1.755	1.602	8.7	110	-0.02
5	T 1,2-Dichloro-1,1,2,2-tetraf	1.331	1.088	18.3	100	-0.02
6	T Vinyl Chloride	1.681	1.506	10.4	108	-0.02
7	T 1,3-Butadiene	1.422	1.141	19.8	100	-0.02
8	T Bromomethane	1.047	0.926	11.6	107	-0.02
9	T Chloroethane	0.899	0.790	12.1	107	-0.02
10	T Ethanol	0.859	0.755	12.1	105	-0.11
11	T Acetonitrile	1.752	1.579	9.9	107	-0.06
12	T Acrolein	0.616	0.561	8.9	105	-0.02
13	T Acetone	0.824	0.708	14.1	104	-0.07
14	T Trichlorofluoromethane	2.206	1.793	18.7	101	-0.02
15	T 2-Propanol (Isopropanol)	2.333	2.115	9.3	117	-0.08
16	T Acrylonitrile	1.342	1.191	11.3	105	-0.05
17	T 1,1-Dichloroethene	1.106	0.967	12.6	104	-0.02
18	T 2-Methyl-2-Propanol (tert-B	1.934	0.643	66.8#	90	-0.05
19	T Methylene Chloride	1.118	0.974	12.9	105	-0.03
20	T 3-Chloro-1-propene (Allyl C	2.142	1.556	27.4	102	-0.03
21	T Trichlorotrifluoroethane	1.094	0.950	13.2	103	-0.01
22	T Carbon Disulfide	3.803	3.456	9.1	105	-0.02
23	T trans-1,2-Dichloroethene	1.536	1.371	10.7	101	-0.02
24	T 1,1-Dichloroethane	2.081	1.732	16.8	103	-0.02
25	T Methyl tert-Butyl Ether	3.020	2.736	9.4	106	-0.02
26	T Vinyl Acetate	0.288	0.286	0.7	104	-0.05
27	T 2-Butanone (MEK)	0.851	0.675	20.7	104	-0.04
28	T cis-1,2-Dichloroethene	1.539	1.275	17.2	102	-0.02
29	T Diisopropyl Ether	1.059	1.005	5.1	103	-0.02
30	T Ethyl Acetate	0.409	0.367	10.3	103	-0.03
31	T n-Hexane	2.136	1.775	16.9	104	-0.02
32	T Chloroform	1.946	1.582	18.7	101	-0.03
33	S 1,2-Dichloroethane-d4 (SS1)	1.302	1.202	7.7	110	-0.02
34	T Tetrahydrofuran (THF)	0.758	0.671	11.5	105	-0.02
35	T Ethyl tert-Butyl Ether	1.205	1.196	0.7	109	-0.01
36	T 1,2-Dichloroethane	1.527	1.202	21.3	97	-0.02
37	IR 1,4-Difluorobenzene (IS2)	1.000	1.000	0.0	115	-0.01
38	T 1,1,1-Trichloroethane	0.455	0.389	14.5	100	-0.01
39	T Isopropyl Acetate	0.169	0.151	10.7	103	-0.02
40	T 1-Butanol	0.268	0.265	1.1	102	0.00
41	T Benzene	1.166	0.928	20.4	104	-0.02
42	T Carbon Tetrachloride	0.357	0.318	10.9	100	-0.01
43	T Cyclohexane	0.470	0.409	13.0	104	-0.02
44	T tert-Amyl Methyl Ether	0.676	0.660	2.4	107	-0.02
45	T 1,2-Dichloropropane	0.278	0.241	13.3	103	-0.02
46	T Bromodichloromethane	0.365	0.325	11.0	101	-0.02
47	T Trichloroethene	0.346	0.301	13.0	103	-0.02
48	T 1,4-Dioxane	0.228	0.212	7.0	103	-0.02
49	T 2,2,4-Trimethylpentane (Iso	1.277	1.065	16.6	101	-0.02

VR111113

Evaluate Continuing Calibration Report

Data Path : I:\MS08\Data\2013_01\16\
 Data File : 01161301.D
 Acq On : 16 Jan 2013 9:12 am
 Operator : KR/WA
 Sample : 25ng TO-15 CCV STD (1/17)
 Misc : S25-01071301/S25-12191203
 ALS Vial : 14 Sample Multiplier: 1

Quant Time: Jan 16 10:31:01 2013
 Quant Method : J:\MS08\Methods\R8122712.M
 Quant Title : EPA TO-15 per SOP VOA-TO15 (CASS TO-15/GC-MS)
 QLast Update : Fri Dec 28 10:19:21 2012
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 200%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
50 T	Methyl Methacrylate	0.131	0.120	8.4	103	-0.02
51 T	n-Heptane	0.317	0.274	13.6	104	-0.02
52 T	cis-1,3-Dichloropropene	0.440	0.397	9.8	102	-0.01
53 T	4-Methyl-2-pentanone	0.258	0.235	8.9	102	-0.02
54 T	trans-1,3-Dichloropropene	0.379	0.355	6.3	101	-0.01
55 T	1,1,2-Trichloroethane	0.277	0.246	11.2	103	-0.02
56 IR	Chlorobenzene-d5 (IS3)	1.000	1.000	0.0	116	0.00
57 S	Toluene-d8 (SS2)	2.229	2.231	-0.1	116	0.00
58 T	Toluene	2.685	2.187	18.5	103	-0.02
59 T	2-Hexanone	1.313	1.063	19.0	100	-0.02
60 T	Dibromochloromethane	0.658	0.611	7.1	102	-0.01
61 T	1,2-Dibromoethane	0.681	0.590	13.4	102	0.00
62 T	n-Butyl Acetate	1.546	1.296	16.2	99	-0.01
63 T	n-Octane	0.559	0.467	16.5	102	-0.01
64 T	Tetrachloroethene	0.940	0.771	18.0	104	-0.01
65 T	Chlorobenzene	1.746	1.457	16.6	103	-0.01
66 T	Ethylbenzene	2.986	2.465	17.4	102	-0.01
67 T	m- & p-Xylenes	2.431	1.969	19.0	101	-0.01
68 T	Bromoform	0.597	0.592	0.8	103	-0.02
69 T	Styrene	1.782	1.575	11.6	102	-0.01
70 T	o-Xylene	2.449	1.993	18.6	101	-0.01
71 T	n-Nonane	1.290	1.037	19.6	97	-0.01
72 T	1,1,2,2-Tetrachloroethane	1.027	0.925	9.9	102	-0.01
73 S	Bromofluorobenzene (SS3)	1.138	1.183	-4.0	119	0.00
74 T	Cumene	3.224	2.659	17.5	101	-0.01
75 T	alpha-Pinene	1.390	1.203	13.5	94	0.00
76 T	n-Propylbenzene	3.740	3.040	18.7	99	-0.01
77 T	3-Ethyltoluene	3.163	2.560	19.1	93	-0.01
78 T	4-Ethyltoluene	2.833	2.382	15.9	107	-0.01
79 T	1,3,5-Trimethylbenzene	2.435	2.025	16.8	100	-0.01
80 T	alpha-Methylstyrene	1.225	1.176	4.0	97	-0.02
81 T	2-Ethyltoluene	3.055	2.484	18.7	98	-0.01
82 T	1,2,4-Trimethylbenzene	2.474	2.021	18.3	97	-0.02
83 T	n-Decane	1.265	1.030	18.6	95	-0.01
84 T	Benzyl Chloride	1.752	1.744	0.5	100	-0.01
85 T	1,3-Dichlorobenzene	1.537	1.212	21.1	99	-0.02
86 T	1,4-Dichlorobenzene	1.634	1.276	21.9	101	-0.01
87 T	sec-Butylbenzene	3.270	2.663	18.6	96	-0.01
88 T	4-Isopropyltoluene (p-Cymen)	3.392	2.884	15.0	98	-0.01
89 T	1,2,3-Trimethylbenzene	2.504	2.081	16.9	98	-0.01
90 T	1,2-Dichlorobenzene	1.486	1.228	17.4	101	-0.01
91 T	d-Limonene	0.732	0.702	4.1	96	-0.01
92 T	1,2-Dibromo-3-Chloropropane	0.513	0.488	4.9	101	-0.01
93 T	n-Undecane	1.198	0.980	18.2	94	0.00
94 T	1,2,4-Trichlorobenzene	1.009	0.936	7.2	97	0.00
95 T	Naphthalene	3.093	2.894	6.4	95	-0.01
96 T	n-Dodecane	1.046	0.936	10.5	97	0.00
97 T	Hexachlorobutadiene	0.700	0.621	11.3	102	0.00
98 T	Cyclohexanone	0.869	0.754	13.2	101	-0.02

Evaluate Continuing Calibration Report

Data Path : I:\MS08\Data\2013_01\16\
Data File : 01161301.D
Acq On : 16 Jan 2013 9:12 am
Operator : KR/WA
Sample : 25ng TO-15 CCV STD (1/17)
Misc : S25-01071301/S25-12191203
ALS Vial : 14 Sample Multiplier: 1

Quant Time: Jan 16 10:31:01 2013
Quant Method : J:\MS08\Methods\R8122712.M
Quant Title : EPA TO-15 per SOP VOA-TO15 (CASS TO-15/GC-MS)
QLast Update : Fri Dec 28 10:19:21 2012
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.33min
Max. RRF Dev : 30% Max. Rel. Area : 200%

Compound	AvgRF	CCRF	%Dev	Area	% Dev (min)
99 T tert-Butylbenzene	2.529	2.084	17.6	98	-0.01
100 T n-Butylbenzene	2.413	1.989	17.6	95	-0.01

(#) = Out of Range

SPCC's out = 0 CCC's out = 0

Kelli 1/16/13

Evaluate Continuing Calibration Report

Data Path : I:\MS08\Data\2013_01\17\
 Data File : 01171301.D
 Acq On : 17 Jan 2013 7:10
 Operator : KR/WA
 Sample : 25ng TO-15 CCV STD (1/17)
 Misc : S25-01071301/S25-12191203 (1/17)
 ALS Vial : 14 Sample Multiplier: 1

Quant Time: Jan 17 07:49:21 2013
 Quant Method : J:\MS08\Methods\R8122712.M
 Quant Title : EPA TO-15 per SOP VOA-TO15 (CASS TO-15/GC-MS)
 QLast Update : Fri Dec 28 10:19:21 2012
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 200%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev (min)
1	IR Bromochloromethane (IS1)	1.000	1.000	0.0	109	-0.02
2	T Propene	1.542	1.557	-1.0	104	-0.01
3	T Dichlorodifluoromethane (CF	2.461	2.389	2.9	111	-0.02
4	T Chloromethane	1.755	1.841	-4.9	117	-0.02
5	T 1,2-Dichloro-1,1,2,2-tetrafa	1.331	1.255	5.7	107	-0.02
6	T Vinyl Chloride	1.681	1.730	-2.9	115	-0.02
7	T 1,3-Butadiene	1.422	1.331	6.4	108	-0.02
8	T Bromomethane	1.047	1.057	-1.0	114	-0.03
9	T Chloroethane	0.899	0.904	-0.6	113	-0.02
10	T Ethanol	0.859	0.857	0.2	111	-0.11
11	T Acetonitrile	1.752	1.831	-4.5	115	-0.07
12	T Acrolein	0.616	0.638	-3.6	111	-0.02
13	T Acetone	0.824	0.797	3.3	109	-0.06
14	T Trichlorofluoromethane	2.206	2.039	7.6	106	-0.02
15	T 2-Propanol (Isopropanol)	2.333	2.411	-3.3	124	-0.08
16	T Acrylonitrile	1.342	1.357	-1.1	111	-0.05
17	T 1,1-Dichloroethene	1.106	1.098	0.7	110	-0.02
18	T 2-Methyl-2-Propanol (tert-B	1.934	0.658	66.0#	85	-0.05
19	T Methylene Chloride	1.118	1.113	0.4	111	-0.03
20	T 3-Chloro-1-propene (Allyl C	2.142	1.789	16.5	108	-0.03
21	T Trichlorotrifluoroethane	1.094	1.085	0.8	109	-0.02
22	T Carbon Disulfide	3.803	3.960	-4.1	111	-0.03
23	T trans-1,2-Dichloroethene	1.536	1.576	-2.6	108	-0.02
24	T 1,1-Dichloroethane	2.081	1.979	4.9	109	-0.02
25	T Methyl tert-Butyl Ether	3.020	3.092	-2.4	111	-0.02
26	T Vinyl Acetate	0.288	0.327	-13.5	111	-0.04
27	T 2-Butanone (MEK)	0.851	0.771	9.4	111	-0.04
28	T cis-1,2-Dichloroethene	1.539	1.451	5.7	108	-0.02
29	T Diisopropyl Ether	1.059	1.146	-8.2	109	-0.02
30	T Ethyl Acetate	0.409	0.418	-2.2	109	-0.03
31	T n-Hexane	2.136	2.008	6.0	109	-0.02
32	T Chloroform	1.946	1.814	6.8	108	-0.03
33	S 1,2-Dichloroethane-d4 (SS1)	1.302	1.213	6.8	103	-0.02
34	T Tetrahydrofuran (THF)	0.758	0.764	-0.8	110	-0.02
35	T Ethyl tert-Butyl Ether	1.205	1.364	-13.2	115	-0.01
36	T 1,2-Dichloroethane	1.527	1.382	9.5	104	-0.02
37	IR 1,4-Difluorobenzene (IS2)	1.000	1.000	0.0	108	-0.01
38	T 1,1,1-Trichloroethane	0.455	0.436	4.2	106	-0.02

Evaluate Continuing Calibration Report

Data Path : I:\MS08\Data\2013_01\17\
 Data File : 01171301.D
 Acq On : 17 Jan 2013 7:10
 Operator : KR/WA
 Sample : 25ng TO-15 CCV STD (1/17)
 Misc : S25-01071301/S25-12191203 (1/17)
 ALS Vial : 14 Sample Multiplier: 1

Quant Time: Jan 17 07:49:21 2013
 Quant Method : J:\MS08\Methods\R8122712.M
 Quant Title : EPA TO-15 per SOP VOA-TO15 (CASS TO-15/GC-MS)
 QLast Update : Fri Dec 28 10:19:21 2012
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 200%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev (min)
39 T	Isopropyl Acetate	0.169	0.170	-0.6	109	-0.02
40 T	1-Butanol	0.268	0.297	-10.8	108	0.00
41 T	Benzene	1.166	1.037	11.1	110	-0.02
42 T	Carbon Tetrachloride	0.357	0.357	0.0	106	-0.01
43 T	Cyclohexane	0.470	0.452	3.8	108	-0.02
44 T	tert-Amyl Methyl Ether	0.676	0.735	-8.7	113	-0.02
45 T	1,2-Dichloropropane	0.278	0.271	2.5	109	-0.02
46 T	Bromodichloromethane	0.365	0.366	-0.3	107	-0.02
47 T	Trichloroethene	0.346	0.334	3.5	108	-0.02
48 T	1,4-Dioxane	0.228	0.237	-3.9	109	-0.02
49 T	2,2,4-Trimethylpentane (Iso)	1.277	1.194	6.5	107	-0.02
50 T	Methyl Methacrylate	0.131	0.134	-2.3	109	-0.02
51 T	n-Heptane	0.317	0.303	4.4	109	-0.02
52 T	cis-1,3-Dichloropropene	0.440	0.447	-1.6	109	-0.01
53 T	4-Methyl-2-pentanone	0.258	0.266	-3.1	109	-0.02
54 T	trans-1,3-Dichloropropene	0.379	0.403	-6.3	108	-0.01
55 T	1,1,2-Trichloroethane	0.277	0.276	0.4	109	-0.02
56 IR	Chlorobenzene-d5 (IS3)	1.000	1.000	0.0	107	0.00
57 S	Toluene-d8 (SS2)	2.229	2.247	-0.8	108	0.00
58 T	Toluene	2.685	2.496	7.0	109	-0.01
59 T	2-Hexanone	1.313	1.219	7.2	106	-0.02
60 T	Dibromochloromethane	0.658	0.698	-6.1	108	-0.01
61 T	1,2-Dibromoethane	0.681	0.676	0.7	109	-0.01
62 T	n-Butyl Acetate	1.546	1.483	4.1	105	-0.01
63 T	n-Octane	0.559	0.535	4.3	108	-0.02
64 T	Tetrachloroethene	0.940	0.875	6.9	109	-0.01
65 T	Chlorobenzene	1.746	1.660	4.9	109	-0.01
66 T	Ethylbenzene	2.986	2.810	5.9	108	-0.01
67 T	m- & p-Xylenes	2.431	2.245	7.7	107	-0.01
68 T	Bromoform	0.597	0.670	-12.2	109	-0.02
69 T	Styrene	1.782	1.796	-0.8	108	-0.01
70 T	o-Xylene	2.449	2.285	6.7	107	-0.01
71 T	n-Nonane	1.290	1.225	5.0	106	-0.01
72 T	1,1,2,2-Tetrachloroethane	1.027	1.054	-2.6	108	-0.02
73 S	Bromofluorobenzene (SS3)	1.138	1.164	-2.3	109	0.00
74 T	Cumene	3.224	3.037	5.8	107	-0.01
75 T	alpha-Pinene	1.390	1.380	0.7	100	0.00
76 T	n-Propylbenzene	3.740	3.557	4.9	108	-0.01

Evaluate Continuing Calibration Report

Data Path : I:\MS08\Data\2013_01\17\
 Data File : 01171301.D
 Acq On : 17 Jan 2013 7:10
 Operator : KR/WA
 Sample : 25ng TO-15 CCV STD (1/17)
 Misc : S25-01071301/S25-12191203 (1/17)
 ALS Vial : 14 Sample Multiplier: 1

Quant Time: Jan 17 07:49:21 2013
 Quant Method : J:\MS08\Methods\R8122712.M
 Quant Title : EPA TO-15 per SOP VOA-TO15 (CASS TO-15/GC-MS)
 QLast Update : Fri Dec 28 10:19:21 2012
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 200%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev (min)
77 T	3-Ethyltoluene	3.163	2.964	6.3	100	-0.01
78 T	4-Ethyltoluene	2.833	2.765	2.4	116	-0.01
79 T	1,3,5-Trimethylbenzene	2.435	2.335	4.1	107	-0.01
80 T	alpha-Methylstyrene	1.225	1.376	-12.3	105	-0.02
81 T	2-Ethyltoluene	3.055	2.902	5.0	107	-0.01
82 T	1,2,4-Trimethylbenzene	2.474	2.347	5.1	105	-0.02
83 T	n-Decane	1.265	1.210	4.3	104	-0.01
84 T	Benzyl Chloride	1.752	2.002	-14.3	106	-0.01
85 T	1,3-Dichlorobenzene	1.537	1.370	10.9	104	-0.02
86 T	1,4-Dichlorobenzene	1.634	1.470	10.0	108	-0.01
87 T	sec-Butylbenzene	3.270	3.157	3.5	106	-0.01
88 T	4-Isopropyltoluene (p-Cymen	3.392	3.328	1.9	106	-0.01
89 T	1,2,3-Trimethylbenzene	2.504	2.383	4.8	104	-0.01
90 T	1,2-Dichlorobenzene	1.486	1.407	5.3	107	-0.01
91 T	d-Limonene	0.732	0.839	-14.6	107	-0.01
92 T	1,2-Dibromo-3-Chloropropane	0.513	0.557	-8.6	107	-0.01
93 T	n-Undecane	1.198	1.142	4.7	102	0.00
94 T	1,2,4-Trichlorobenzene	1.009	1.110	-10.0	107	0.00
95 T	Naphthalene	3.093	3.444	-11.3	105	-0.01
96 T	n-Dodecane	1.046	1.027	1.8	99	0.00
97 T	Hexachlorobutadiene	0.700	0.724	-3.4	110	0.00
98 T	Cyclohexanone	0.869	0.863	0.7	107	-0.02
99 T	tert-Butylbenzene	2.529	2.401	5.1	105	-0.01
100 T	n-Butylbenzene	2.413	2.381	1.3	106	-0.01

(#) = Out of Range

SPCC's out = 0 CCC's out = 0

Om 1/17/13

Columbia Analytical Services, Inc.
 2655 Park Center Drive, Suite A
 Simi Valley, CA 93065
 Ph. 805-526-7161
 Fax 805-526-7270

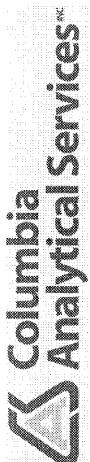
<u>Container IDs</u>	<u>Cleaned Date</u>	<u>Date Analyzed</u>	<u>QC Results</u>	<u>Comments</u>
AC00282	12/27/12	12/28/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC00475	12/26/12	12/27/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC00662	12/27/12	12/28/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC00716	12/26/12	12/27/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC00789	12/27/12	12/28/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC00791	12/26/12	12/27/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC00843	12/27/12	12/28/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC00894	12/27/12	12/28/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC00902	12/27/12	12/28/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC00998	12/27/12	12/28/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01028	12/27/12	12/28/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01188	12/27/12	12/28/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01335	12/26/12	12/27/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01351	12/26/12	12/27/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01466	12/26/12	12/27/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01617	12/27/12	12/28/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01632	12/27/12	12/28/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01816	12/26/12	12/27/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01868	12/26/12	12/27/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01908	12/27/12	12/28/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
FCA00007	12/27/12	12/31/12	12/14/12	
FCA00022	12/13/12	12/27/12	12/31/12	
FCA00031				
FCA00076				
FCA00096				
FCA00179				
FCA00242				
FCA00276				

* QC Canister

<u>Container IDs</u>	<u>Cleaned Date</u>	<u>Date Analyzed</u>	<u>QC Results</u>	<u>Comments</u>
FCA00295	12/13/12	12/14/12		
FCA00304	12/27/12	12/31/12		
FCA00329	12/27/12	12/31/12		
FCA00362	12/27/12	12/31/12		
FCA00387	12/12/12	12/13/12		
FCA00436	12/27/12	12/31/12		
FCA00440	12/27/12	12/31/12		
FCA00457	12/27/12	12/31/12		
FCA00509	12/27/12	12/31/12		
FCA00514	12/27/12	12/31/12		
FCA00546	12/11/12	12/12/12		
FCA00588	12/11/12	12/12/12		

* QC Canister

QC Certification



Columbia Analytical Services, Inc.
2655 Park Center Drive, Suite A
Simi Valley, CA 93065
Ph. 805-526-7161
Fax 805-526-7270

<u>Container IDs</u>	<u>Cleaned Date</u>	<u>Date Analyzed</u>	<u>QC Results</u>	<u>Comments</u>
AC00866	9/14/12	9/18/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01039	9/14/12	9/18/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01049	9/14/12	9/18/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01101	9/14/12	9/18/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01131	9/14/12	9/18/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01257	9/14/12	9/18/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01571	9/14/12	9/18/12	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
FCA00095	10/25/12	10/26/12		
FCA00285	10/25/12	10/26/12		
FCA00293	10/25/12	10/26/12		
FCA00299	10/25/12	10/26/12		
FCA00316	10/25/12	10/26/12		
FCA00511	10/25/12	10/26/12		
FCA00574	10/25/12	10/26/12		

* QC Canister

QC Certification



Columbia Analytical Services, Inc.
2655 Park Center Drive, Suite A
Simi Valley, CA 93065
Ph. 805-526-7161
Fax 805-526-7270

<u>Container IDs</u>	<u>Cleaned Date</u>	<u>Date Analyzed</u>	<u>QC Results</u>	<u>Comments</u>
AC01407	12/28/12	1/3/13	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01453	12/28/12	1/3/13	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01769	12/28/12	1/3/13	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01948	12/28/12	1/3/13	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
FCA00059	1/2/13	1/2/13	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
FCA00177	1/2/13	1/2/13	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
FCA00434	1/2/13	1/2/13	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
FCA00454	1/2/13	1/2/13	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)

* QC Canister

LABORATORY REPORT

July 31, 2013

Karen Mordock
CH2M Hill
1717 Arch Street, Suite 4400
Philadelphia, PA 19103

RE: Pfizer Ambient Air Monitoring / 431248.AM.FW

Dear Karen:

Your report number P1301523 has been amended for the samples submitted to our laboratory on April 11, 2013. The Privileged and Confidential water mark has been removed from all of the report pages. The revised pages have been indicated by the "Revised Page" footer located at the bottom right of the page.

All analyses were performed according to our laboratory's NELAP and DoD-ELAP-approved quality assurance program. The test results meet requirements of the current NELAP and DoD-ELAP standards, where applicable, and except as noted in the laboratory case narrative provided. For a specific list of NELAP and DoD-ELAP-accredited analytes, refer to the certifications section at www.caslab.com. Results are intended to be considered in their entirety and apply only to the samples analyzed and reported herein.

If you have any questions, please call me at (805) 526-7161.

Respectfully submitted,

ALS | Environmental



By Kelly Horiuchi at 8:23 pm, Jul 31, 2013

Kelly Horiuchi
Laboratory Director

Client: CH2M Hill
Project: Pfizer Ambient Air Monitoring / 431248.AM.FW

Service Request No: P1301523

CASE NARRATIVE

The samples were received intact under chain of custody on April 11, 2013 and were stored in accordance with the analytical method requirements. Please refer to the sample acceptance check form for additional information. The results reported herein are applicable only to the condition of the samples at the time of sample receipt.

Volatile Organic Compound Analysis

The samples were analyzed for volatile organic compounds in accordance with EPA Method TO-15 from the Compendium of Methods for the Determination of Toxic Organic Compounds in Ambient Air, Second Edition (EPA/625/R-96/010b), January, 1999. The analytical system was comprised of a gas chromatograph / mass spectrometer (GC/MS) interfaced to a whole-air preconcentrator. Any analytes flagged with an X are not included on the laboratory's NELAP or DoD-ELAP scope of accreditation.

The Summa canisters were cleaned, prior to sampling, down to the method reporting limit (MRL) reported for this project. Please note, projects which require reporting below the MRL could have results between the MRL and method detection limit (MDL) that are biased high.

The results of analyses are given in the attached laboratory report. All results are intended to be considered in their entirety, and Columbia Analytical Services, Inc. dba ALS Environmental (ALS) is not responsible for utilization of less than the complete report.

Use of Columbia Analytical Services, Inc. dba ALS Environmental (ALS)'s Name. Client shall not use ALS's name or trademark in any marketing or reporting materials, press releases or in any other manner ("Materials") whatsoever and shall not attribute to ALS any test result, tolerance or specification derived from ALS's data ("Attribution") without ALS's prior written consent, which may be withheld by ALS for any reason in its sole discretion. To request ALS's consent, Client shall provide copies of the proposed Materials or Attribution and describe in writing Client's proposed use of such Materials or Attribution. If ALS has not provided written approval of the Materials or Attribution within ten (10) days of receipt from Client, Client's request to use ALS's name or trademark in any Materials or Attribution shall be deemed denied. ALS may, in its discretion, reasonably charge Client for its time in reviewing Materials or Attribution requests. Client acknowledges and agrees that the unauthorized use of ALS's name or trademark may cause ALS to incur irreparable harm for which the recovery of money damages will be inadequate. Accordingly, Client acknowledges and agrees that a violation shall justify preliminary injunctive relief. For questions contact the laboratory.

Columbia Analytical Services, Inc. dba ALS Environmental – Simi Valley

Certifications, Accreditations, and Registrations

Agency	Web Site	Number
AIHA	http://www.aihaaccreditedlabs.org	101661
Arizona DHS	http://www.azdhs.gov/lab/license/env.htm	AZ0694
DoD ELAP	http://www.pjlabs.com/search-accredited-labs	L11-203
Florida DOH (NELAP)	http://www.doh.state.fl.us/lab/EnvLabCert/WaterCert.htm	E871020
Maine DHHS	http://www.maine.gov/dhhs/mecdc/environmental-health/water/dwp-services/labcert/labcert.htm	2012039
Minnesota DOH (NELAP)	http://www.health.state.mn.us/accreditation	494864
New Jersey DEP (NELAP)	http://www.nj.gov/dep/oqa/	CA009
New York DOH (NELAP)	http://www.wadsworth.org/labcert/elap/elap.html	11221
Oregon PHD (NELAP)	http://public.health.oregon.gov/LaboratoryServices/EnvironmentalLaboratoryAccreditation/Pages/index.aspx	CA200007
Pennsylvania DEP	http://www.depweb.state.pa.us/labs	68-03307 (Registration)
Texas CEQ (NELAP)	http://www.tceq.texas.gov/field/qa/env_lab_accreditation.html	T104704413 -12-3
Utah DOH (NELAP)	http://www.health.utah.gov/lab/labimp/certification/index.html	CA01527201 2-2
Washington DOE	http://www.ecy.wa.gov/programs/eap/labs/lab-accreditation.html	C946

Analyses were performed according to our laboratory's NELAP and DoD-ELAP approved quality assurance program. A complete listing of specific NELAP and DoD-ELAP certified analytes can be found in the certifications section at www.caslab.com, www.alsglobal.com, or at the accreditation body's website.

Each of the certifications listed above have an explicit Scope of Accreditation that applies to specific matrices/methods/analytes; therefore, please contact the laboratory for information corresponding to a particular certification.

DETAIL SUMMARY REPORT

Client: CH2M Hill Service Request: P1301523
 Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

Date Received: 4/11/2013
 Time Received: 09:40

TO-15 - VOC Cans

Client Sample ID	Lab Code	Matrix	Date Collected	Time Collected	Container ID	Pi1 (psig)	Pf1 (psig)	TO-15 - VOC Cans
PZAA-P1-041013	P1301523-001	Air	4/10/2013	08:47	AC01280	-1.84	3.59	X
PZAA-P2-041013	P1301523-002	Air	4/10/2013	14:42	AC00813	-4.66	3.66	X
PZAA-P3-041013	P1301523-003	Air	4/10/2013	14:36	AC01434	-6.14	3.55	X
PZAA-P4-041013	P1301523-004	Air	4/10/2013	14:50	AS00403	-2.14	3.74	X
PZAA-P5-041013	P1301523-005	Air	4/10/2013	14:02	AC01644	-2.41	3.58	X
PZAA-P6-041013	P1301523-006	Air	4/10/2013	14:06	AS00123	-2.45	3.62	X
PZAA-P7-041013	P1301523-007	Air	4/10/2013	13:52	AC01588	-3.00	3.52	X
PZAA-P8-041013	P1301523-008	Air	4/10/2013	13:45	AC00981	-2.86	3.56	X
PZAA-C1-041013	P1301523-009	Air	4/10/2013	14:25	AC01183	-2.20	3.54	X
PZAA-C2-041013	P1301523-010	Air	4/10/2013	14:20	AS00391	-3.40	3.58	X
PZAA-C3-041013	P1301523-011	Air	4/10/2013	14:30	AC01955	-1.72	3.55	X
PZAA-C4-041013	P1301523-012	Air	4/10/2013	14:18	AC01572	-2.55	3.61	X
PZAA-C3-041013-D	P1301523-013	Air	4/10/2013	09:44	AC01336	-3.18	3.53	X

Air - Chain of Custody Record & Analytical Service Request

 Page 1 of 1

 Requested Turnaround Time in Business Days (Surcharges) please circle Per SOW
 1 Day (100%) 2 Day (75%) 3 Day (50%) 4 Day (35%) 5 Day (25%) 10 Day Standard

Project Name & Address (Reporting Information)							CAS Contact:			Comments		
Pfizer Ambient Air Monitoring							K. Horn (KA)			e.g. Actual Preservative or specific instructions		
Project Number 4131246, AK, FW							Analysis Method					
P.O. # / Billing Information												
Phone 2107.6975.0198 Fax 215.640.9212							Sampler (Print & Sign) <i>Jay</i>					
Email Address for Result Reporting Karen.Kirchock@ch2m.com							Location: Beechler					
Client Sample ID	Laboratory ID Number	Date Collected	Time Collected	Canister ID (Bar code # - AC, SC, etc.)	Flow Controller ID (Bar code # - FC #)	Canister Start Pressure "Hg	Canister End Pressure "Hg/psig	Sample Volume	Sample Type			
P2AA-P1-041013	① A-76	4/16/13	08417	AC01290	FCA000231	-30.12	-4.38	6L	X			
P2AA-P2-041013	② -436		14412	AC00813	FCA000051	-30.07	-9.70	6L	X			
P2AA-P3-041013	③ C-12		14316	AC01434	FCA00023	-30.09	-13.01	6L	X			
P2AA-P4-041013	④ -219		14500	AS00403	FCA000259	-30.10	-4.82	6L	X			
P2AA-P5-041013	⑤ -242		14022	AC01644	FCA000262	-30.09	-5.41	6L	X			
P2AA-P6-041013	⑥ -239		14006	AS00123	FCA000277	-30.11	-5.40	6L	X			
P2AA-P7-041013	⑦ -294		1352-	AC01588	FCA000501	-30.10	-6.59	6L	X			
P2AA-P8-041013	⑧ -281		13415	AC00981	FCA00005	-30.06	-6.08	6L	X			
P2AA-C1-041013	⑨ -220		1425	AC01183	FCA000519	-30.10	-4.82	6L	X			
P2AA-C2-041013	⑩ -346		1420	AS00391	FCA00143	-30.17	-7.24	6L	X			
P2AA-C3-041013	⑪ -193		1430	AC01955	FCA000616	-30.04	-6.81	6L	X			
P2AA-CH-041013	⑫ -150		14118	AC01572	FCA000111	-30.12	-5.50	6L	X			
P2AA-C3-041013-D	⑬ -316		09414	AC01336	FCA00470	-30.08	-4.22	6L	X			
Revis												
Report Tier Levels - please select							Per SOW			Per SOW		
Tier I - Results (Default if not specified) _____							EDD required Yes / No			Project Requirements		
Tier II (Results + QC Summaries) _____							Type: _____			(MRLs, QAPP)		
Tier III (Results + QC & Calibration Summaries) _____												
Tier IV (Data Validation Package) 10% Surcharge _____												
Renewed by: (Signature) <i>Leslie Beechler</i>							Date: <u>7/11/13</u>	Time: <u>1900</u>	Received by: (Signature) <i>Leanne</i>	Date: <u>7/11/13</u>	Time: <u>0400</u>	
Renewed by: (Signature)							Date: <u></u>	Time: <u></u>	Received by: (Signature)	Date: <u></u>	Time: <u></u>	Temperature: <u>°C</u>

Sample Acceptance Check Form

 Client: CH2M Hill

 Work order: P1301523

 Project: Pfizer Ambient Air Monitoring / 431248.AM.FW

 Sample(s) received on: 4/11/13

 Date opened: 4/11/13

 by: RМАRТЕNIES

Note: This form is used for all samples received by ALS. The use of this form for custody seals is strictly meant to indicate presence/absence and not as an indication of compliance or nonconformity. Thermal preservation and pH will only be evaluated either at the request of the client and/or as required by the method/SOP.

Yes No N/A

 1 Were **sample containers** properly marked with client sample ID?

 2 Container(s) **supplied by ALS?**

 3 Did **sample containers** arrive in good condition?

 4 Were **chain-of-custody** papers used and filled out?

 5 Did **sample container labels** and/or tags agree with custody papers?

 6 Was **sample volume** received adequate for analysis?

7 Are samples within specified holding times?

 8 Was proper **temperature** (thermal preservation) of cooler at receipt adhered to?

 9 Was a **trip blank** received?

 10 Were **custody seals** on outside of cooler/Box?

 Location of seal(s)? _____ Sealing Lid?

Were signature and date included?

Were seals intact?

Were custody seals on outside of sample container?

 Location of seal(s)? _____ Sealing Lid?

Were signature and date included?

Were seals intact?

 11 Do containers have appropriate **preservation**, according to method/SOP or Client specified information?

 Is there a client indication that the submitted samples are **pH** preserved?

 Were **VOA vials** checked for presence/absence of air bubbles?

 Does the client/method/SOP require that the analyst check the sample pH and if necessary alter it?

 12 **Tubes:** Are the tubes capped and intact?

Do they contain moisture?

 13 **Badges:** Are the badges properly capped and intact?

Are dual bed badges separated and individually capped and intact?

Lab Sample ID	Container Description	Required pH *	Received pH	Adjusted pH	VOA Headspace (Presence/Absence)	Receipt / Preservation Comments
P1301523-001.01	6.0 L Ambient Can					
P1301523-002.01	6.0 L Ambient Can					
P1301523-003.01	6.0 L Ambient Can					
P1301523-004.01	6.0 L Silonite Can					
P1301523-005.01	6.0 L Ambient Can					
P1301523-006.01	6.0 L Silonite Can					
P1301523-007.01	6.0 L Ambient Can					
P1301523-008.01	6.0 L Ambient Can					

Explain any discrepancies: (include lab sample ID numbers): _____

Sample Acceptance Check Form

Client: CH2M Hill

Work order: P1301523

Project: Pfizer Ambient Air Monitoring / 431248.AM.FW

Sample(s) received on: 4/11/13 Date opened: 4/11/13 by: RМАTENIES

Explain any discrepancies: (include lab sample ID numbers):

RSK - MEEPP, HCl, (pH<2); RSK - CO₂, (pH 5-8); Sulfur (pH>4)

RESULTS OF ANALYSIS

Page 1 of 3

Client: CH2M Hill

Client Sample ID: PZAA-P1-041013

CAS Project ID: P1301523

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1301523-001

Test Code: EPA TO-15

Date Collected: 4/10/13

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: 4/11/13

Analyst: Simon Cao

Date Analyzed: 4/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01280

Initial Pressure (psig): -1.84 Final Pressure (psig): 3.59

Canister Dilution Factor: 1.42

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	0.90	0.71	0.52	0.41	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.0	0.71	0.40	0.14	
74-87-3	Chloromethane	0.45	0.28	0.22	0.14	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.71	ND	0.10	
75-01-4	Vinyl Chloride	ND	0.14	ND	0.056	
106-99-0	1,3-Butadiene	ND	0.28	ND	0.13	
74-83-9	Bromomethane	ND	0.14	ND	0.037	
75-00-3	Chloroethane	ND	0.14	ND	0.054	
64-17-5	Ethanol	9.3	7.1	5.0	3.8	
75-05-8	Acetonitrile	ND	0.71	ND	0.42	
107-02-8	Acrolein	ND	2.8	ND	1.2	
67-64-1	Acetone	12	7.1	4.9	3.0	
75-69-4	Trichlorofluoromethane	1.0	0.14	0.18	0.025	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	7.1	ND	2.9	
107-13-1	Acrylonitrile	ND	0.71	ND	0.33	
75-35-4	1,1-Dichloroethene	ND	0.14	ND	0.036	
75-09-2	Methylene Chloride	ND	0.71	ND	0.20	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.14	ND	0.045	
76-13-1	Trichlorotrifluoroethane	0.51	0.14	0.067	0.019	
75-15-0	Carbon Disulfide	ND	7.1	ND	2.3	
156-60-5	trans-1,2-Dichloroethene	ND	0.14	ND	0.036	
75-34-3	1,1-Dichloroethane	ND	0.14	ND	0.035	
1634-04-4	Methyl tert-Butyl Ether	ND	0.14	ND	0.039	
108-05-4	Vinyl Acetate	ND	7.1	ND	2.0	
78-93-3	2-Butanone (MEK)	ND	7.1	ND	2.4	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 2 of 3

Client: CH2M Hill

Client Sample ID: PZAA-P1-041013

CAS Project ID: P1301523

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1301523-001

Test Code: EPA TO-15

Date Collected: 4/10/13

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: 4/11/13

Analyst: Simon Cao

Date Analyzed: 4/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01280

Initial Pressure (psig): -1.84 Final Pressure (psig): 3.59

Canister Dilution Factor: 1.42

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.14	ND	0.036	
141-78-6	Ethyl Acetate	1.8	1.4	0.49	0.39	
110-54-3	n-Hexane	ND	0.71	ND	0.20	
67-66-3	Chloroform	ND	0.14	ND	0.029	
109-99-9	Tetrahydrofuran (THF)	ND	0.71	ND	0.24	
107-06-2	1,2-Dichloroethane	ND	0.14	ND	0.035	
71-55-6	1,1,1-Trichloroethane	ND	0.14	ND	0.026	
71-43-2	Benzene	0.69	0.14	0.22	0.044	
56-23-5	Carbon Tetrachloride	0.46	0.14	0.073	0.023	
110-82-7	Cyclohexane	ND	1.4	ND	0.41	
78-87-5	1,2-Dichloropropane	ND	0.14	ND	0.031	
75-27-4	Bromodichloromethane	ND	0.14	ND	0.021	
79-01-6	Trichloroethene	ND	0.14	ND	0.026	
123-91-1	1,4-Dioxane	ND	0.71	ND	0.20	
80-62-6	Methyl Methacrylate	ND	1.4	ND	0.35	
142-82-5	n-Heptane	ND	0.71	ND	0.17	
10061-01-5	cis-1,3-Dichloropropene	ND	0.71	ND	0.16	
108-10-1	4-Methyl-2-pentanone	ND	0.71	ND	0.17	
10061-02-6	trans-1,3-Dichloropropene	ND	0.71	ND	0.16	
79-00-5	1,1,2-Trichloroethane	ND	0.14	ND	0.026	
108-88-3	Toluene	2.1	0.71	0.56	0.19	
591-78-6	2-Hexanone	ND	0.71	ND	0.17	
124-48-1	Dibromochloromethane	ND	0.14	ND	0.017	
106-93-4	1,2-Dibromoethane	ND	0.14	ND	0.018	
123-86-4	n-Butyl Acetate	ND	0.71	ND	0.15	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P1-041013
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1301523
 CAS Sample ID: P1301523-001

Test Code:	EPA TO-15	Date Collected:	4/10/13
Instrument ID:	Tekmar AUTOCAN/HP5973/HP6890/MS3	Date Received:	4/11/13
Analyst:	Simon Cao	Date Analyzed:	4/16/13
Sample Type:	6.0 L Summa Canister	Volume(s) Analyzed:	1.00 Liter(s)
Test Notes:			
Container ID:	AC01280		

Initial Pressure (psig): -1.84 Final Pressure (psig): 3.59

Canister Dilution Factor: 1.42

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.71	ND	0.15	
127-18-4	Tetrachloroethene	ND	0.14	ND	0.021	
108-90-7	Chlorobenzene	ND	0.14	ND	0.031	
100-41-4	Ethylbenzene	ND	0.71	ND	0.16	
179601-23-1	m,p-Xylenes	1.2	0.71	0.28	0.16	
75-25-2	Bromoform	ND	0.71	ND	0.069	
100-42-5	Styrene	ND	0.71	ND	0.17	
95-47-6	o-Xylene	ND	0.71	ND	0.16	
111-84-2	n-Nonane	ND	0.71	ND	0.14	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.14	ND	0.021	
98-82-8	Cumene	ND	0.71	ND	0.14	
80-56-8	alpha-Pinene	1.4	0.71	0.25	0.13	
103-65-1	n-Propylbenzene	ND	0.71	ND	0.14	
622-96-8	4-Ethyltoluene	ND	0.71	ND	0.14	
108-67-8	1,3,5-Trimethylbenzene	ND	0.71	ND	0.14	
95-63-6	1,2,4-Trimethylbenzene	ND	0.71	ND	0.14	
100-44-7	Benzyl Chloride	ND	0.71	ND	0.14	
541-73-1	1,3-Dichlorobenzene	ND	0.14	ND	0.024	
106-46-7	1,4-Dichlorobenzene	ND	0.14	ND	0.024	
95-50-1	1,2-Dichlorobenzene	ND	0.14	ND	0.024	
5989-27-5	d-Limonene	ND	0.71	ND	0.13	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.71	ND	0.073	
120-82-1	1,2,4-Trichlorobenzene	ND	0.71	ND	0.096	
91-20-3	Naphthalene	ND	0.71	ND	0.14	
87-68-3	Hexachlorobutadiene	ND	0.71	ND	0.067	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 1 of 3

Client: CH2M Hill

Client Sample ID: PZAA-P2-041013

CAS Project ID: P1301523

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1301523-002

Test Code: EPA TO-15

Date Collected: 4/10/13

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: 4/11/13

Analyst: Simon Cao

Date Analyzed: 4/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC00813

Initial Pressure (psig): -4.66 Final Pressure (psig): 3.66

Canister Dilution Factor: 1.83

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	1.4	0.92	0.81	0.53	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.2	0.92	0.44	0.19	
74-87-3	Chloromethane	0.55	0.37	0.27	0.18	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.92	ND	0.13	
75-01-4	Vinyl Chloride	ND	0.18	ND	0.072	
106-99-0	1,3-Butadiene	ND	0.37	ND	0.17	
74-83-9	Bromomethane	ND	0.18	ND	0.047	
75-00-3	Chloroethane	ND	0.18	ND	0.069	
64-17-5	Ethanol	14	9.2	7.5	4.9	
75-05-8	Acetonitrile	ND	0.92	ND	0.55	
107-02-8	Acrolein	ND	3.7	ND	1.6	
67-64-1	Acetone	17	9.2	7.2	3.9	
75-69-4	Trichlorofluoromethane	1.2	0.18	0.21	0.033	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	9.2	ND	3.7	
107-13-1	Acrylonitrile	ND	0.92	ND	0.42	
75-35-4	1,1-Dichloroethene	ND	0.18	ND	0.046	
75-09-2	Methylene Chloride	0.95	0.92	0.27	0.26	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.18	ND	0.058	
76-13-1	Trichlorotrifluoroethane	0.59	0.18	0.077	0.024	
75-15-0	Carbon Disulfide	ND	9.2	ND	2.9	
156-60-5	trans-1,2-Dichloroethene	ND	0.18	ND	0.046	
75-34-3	1,1-Dichloroethane	ND	0.18	ND	0.045	
1634-04-4	Methyl tert-Butyl Ether	ND	0.18	ND	0.051	
108-05-4	Vinyl Acetate	ND	9.2	ND	2.6	
78-93-3	2-Butanone (MEK)	ND	9.2	ND	3.1	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 2 of 3

Client: CH2M Hill

Client Sample ID: PZAA-P2-041013

CAS Project ID: P1301523

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1301523-002

Test Code: EPA TO-15

Date Collected: 4/10/13

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: 4/11/13

Analyst: Simon Cao

Date Analyzed: 4/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC00813

Initial Pressure (psig): -4.66 Final Pressure (psig): 3.66

Canister Dilution Factor: 1.83

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.18	ND	0.046	
141-78-6	Ethyl Acetate	2.9	1.8	0.80	0.51	
110-54-3	n-Hexane	ND	0.92	ND	0.26	
67-66-3	Chloroform	0.21	0.18	0.043	0.037	
109-99-9	Tetrahydrofuran (THF)	ND	0.92	ND	0.31	
107-06-2	1,2-Dichloroethane	ND	0.18	ND	0.045	
71-55-6	1,1,1-Trichloroethane	ND	0.18	ND	0.034	
71-43-2	Benzene	1.3	0.18	0.39	0.057	
56-23-5	Carbon Tetrachloride	0.38	0.18	0.060	0.029	
110-82-7	Cyclohexane	ND	1.8	ND	0.53	
78-87-5	1,2-Dichloropropane	ND	0.18	ND	0.040	
75-27-4	Bromodichloromethane	ND	0.18	ND	0.027	
79-01-6	Trichloroethene	ND	0.18	ND	0.034	
123-91-1	1,4-Dioxane	ND	0.92	ND	0.25	
80-62-6	Methyl Methacrylate	ND	1.8	ND	0.45	
142-82-5	n-Heptane	ND	0.92	ND	0.22	
10061-01-5	cis-1,3-Dichloropropene	ND	0.92	ND	0.20	
108-10-1	4-Methyl-2-pentanone	ND	0.92	ND	0.22	
10061-02-6	trans-1,3-Dichloropropene	ND	0.92	ND	0.20	
79-00-5	1,1,2-Trichloroethane	ND	0.18	ND	0.034	
108-88-3	Toluene	3.2	0.92	0.86	0.24	
591-78-6	2-Hexanone	ND	0.92	ND	0.22	
124-48-1	Dibromochloromethane	ND	0.18	ND	0.021	
106-93-4	1,2-Dibromoethane	ND	0.18	ND	0.024	
123-86-4	n-Butyl Acetate	ND	0.92	ND	0.19	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 3 of 3

Client: CH2M Hill
Client Sample ID: PZAA-P2-041013
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1301523
 CAS Sample ID: P1301523-002

Test Code:	EPA TO-15	Date Collected:	4/10/13
Instrument ID:	Tekmar AUTOCAN/HP5973/HP6890/MS3	Date Received:	4/11/13
Analyst:	Simon Cao	Date Analyzed:	4/16/13
Sample Type:	6.0 L Summa Canister	Volume(s) Analyzed:	1.00 Liter(s)
Test Notes:			
Container ID:	AC00813		

Initial Pressure (psig): -4.66 Final Pressure (psig): 3.66

Canister Dilution Factor: 1.83

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.92	ND	0.20	
127-18-4	Tetrachloroethene	ND	0.18	ND	0.027	
108-90-7	Chlorobenzene	0.22	0.18	0.047	0.040	
100-41-4	Ethylbenzene	ND	0.92	ND	0.21	
179601-23-1	m,p-Xylenes	1.5	0.92	0.36	0.21	
75-25-2	Bromoform	ND	0.92	ND	0.089	
100-42-5	Styrene	ND	0.92	ND	0.21	
95-47-6	o-Xylene	ND	0.92	ND	0.21	
111-84-2	n-Nonane	ND	0.92	ND	0.17	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.18	ND	0.027	
98-82-8	Cumene	ND	0.92	ND	0.19	
80-56-8	alpha-Pinene	5.6	0.92	1.0	0.16	
103-65-1	n-Propylbenzene	ND	0.92	ND	0.19	
622-96-8	4-Ethyltoluene	ND	0.92	ND	0.19	
108-67-8	1,3,5-Trimethylbenzene	ND	0.92	ND	0.19	
95-63-6	1,2,4-Trimethylbenzene	ND	0.92	ND	0.19	
100-44-7	Benzyl Chloride	ND	0.92	ND	0.18	
541-73-1	1,3-Dichlorobenzene	ND	0.18	ND	0.030	
106-46-7	1,4-Dichlorobenzene	ND	0.18	ND	0.030	
95-50-1	1,2-Dichlorobenzene	ND	0.18	ND	0.030	
5989-27-5	d-Limonene	ND	0.92	ND	0.16	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.92	ND	0.095	
120-82-1	1,2,4-Trichlorobenzene	ND	0.92	ND	0.12	
91-20-3	Naphthalene	1.2	0.92	0.22	0.17	
87-68-3	Hexachlorobutadiene	ND	0.92	ND	0.086	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-P3-041013

CAS Project ID: P1301523

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1301523-003

Test Code: EPA TO-15

Date Collected: 4/10/13

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: 4/11/13

Analyst: Simon Cao

Date Analyzed: 4/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:

0.10 Liter(s)

Container ID: AC01434

Initial Pressure (psig): -6.14 Final Pressure (psig): 3.55

Canister Dilution Factor: 2.13

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	36	1.1	21	0.62	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.0	1.1	0.41	0.22	
74-87-3	Chloromethane	0.46	0.43	0.22	0.21	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	1.1	ND	0.15	
75-01-4	Vinyl Chloride	ND	0.21	ND	0.083	
106-99-0	1,3-Butadiene	3.4	0.43	1.6	0.19	
74-83-9	Bromomethane	ND	0.21	ND	0.055	
75-00-3	Chloroethane	ND	0.21	ND	0.081	
64-17-5	Ethanol	170	11	92	5.7	
75-05-8	Acetonitrile	2.0	1.1	1.2	0.63	
107-02-8	Acrolein	36	4.3	16	1.9	
67-64-1	Acetone	2,100	110	870	45	D
75-69-4	Trichlorofluoromethane	1.1	0.21	0.20	0.038	
67-63-0	2-Propanol (Isopropyl Alcohol)	75	11	31	4.3	
107-13-1	Acrylonitrile	ND	1.1	ND	0.49	
75-35-4	1,1-Dichloroethene	ND	0.21	ND	0.054	
75-09-2	Methylene Chloride	1.1	1.1	0.31	0.31	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.21	ND	0.068	
76-13-1	Trichlorotrifluoroethane	0.54	0.21	0.070	0.028	
75-15-0	Carbon Disulfide	ND	11	ND	3.4	
156-60-5	trans-1,2-Dichloroethene	ND	0.21	ND	0.054	
75-34-3	1,1-Dichloroethane	ND	0.21	ND	0.053	
1634-04-4	Methyl tert-Butyl Ether	ND	0.21	ND	0.059	
108-05-4	Vinyl Acetate	ND	11	ND	3.0	
78-93-3	2-Butanone (MEK)	110	11	36	3.6	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

D = The reported result is from a dilution.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-P3-041013

CAS Project ID: P1301523

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1301523-003

Test Code: EPA TO-15

Date Collected: 4/10/13

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: 4/11/13

Analyst: Simon Cao

Date Analyzed: 4/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:

0.10 Liter(s)

Container ID: AC01434

Initial Pressure (psig): -6.14 Final Pressure (psig): 3.55

Canister Dilution Factor: 2.13

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.21	ND	0.054	
141-78-6	Ethyl Acetate	14	2.1	3.9	0.59	
110-54-3	n-Hexane	2.8	1.1	0.79	0.30	
67-66-3	Chloroform	ND	0.21	ND	0.044	
109-99-9	Tetrahydrofuran (THF)	ND	1.1	ND	0.36	
107-06-2	1,2-Dichloroethane	ND	0.21	ND	0.053	
71-55-6	1,1,1-Trichloroethane	ND	0.21	ND	0.039	
71-43-2	Benzene	12	0.21	3.8	0.067	
56-23-5	Carbon Tetrachloride	ND	0.21	ND	0.034	
110-82-7	Cyclohexane	ND	2.1	ND	0.62	
78-87-5	1,2-Dichloropropane	ND	0.21	ND	0.046	
75-27-4	Bromodichloromethane	ND	0.21	ND	0.032	
79-01-6	Trichloroethene	ND	0.21	ND	0.040	
123-91-1	1,4-Dioxane	ND	1.1	ND	0.30	
80-62-6	Methyl Methacrylate	ND	2.1	ND	0.52	
142-82-5	n-Heptane	5.3	1.1	1.3	0.26	
10061-01-5	cis-1,3-Dichloropropene	ND	1.1	ND	0.23	
108-10-1	4-Methyl-2-pentanone	1.6	1.1	0.40	0.26	
10061-02-6	trans-1,3-Dichloropropene	ND	1.1	ND	0.23	
79-00-5	1,1,2-Trichloroethane	ND	0.21	ND	0.039	
108-88-3	Toluene	2.1	1.1	0.56	0.28	
591-78-6	2-Hexanone	9.5	1.1	2.3	0.26	
124-48-1	Dibromochloromethane	ND	0.21	ND	0.025	
106-93-4	1,2-Dibromoethane	ND	0.21	ND	0.028	
123-86-4	n-Butyl Acetate	ND	1.1	ND	0.22	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P3-041013
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1301523
 CAS Sample ID: P1301523-003

Test Code:	EPA TO-15	Date Collected:	4/10/13
Instrument ID:	Tekmar AUTOCAN/HP5973/HP6890/MS3	Date Received:	4/11/13
Analyst:	Simon Cao	Date Analyzed:	4/16/13
Sample Type:	6.0 L Summa Canister	Volume(s) Analyzed:	1.00 Liter(s)
Test Notes:			0.10 Liter(s)
Container ID:	AC01434		

Initial Pressure (psig): -6.14 Final Pressure (psig): 3.55

Canister Dilution Factor: 2.13

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	6.0	1.1	1.3	0.23	
127-18-4	Tetrachloroethene	ND	0.21	ND	0.031	
108-90-7	Chlorobenzene	ND	0.21	ND	0.046	
100-41-4	Ethylbenzene	ND	1.1	ND	0.25	
179601-23-1	m,p-Xylenes	ND	1.1	ND	0.25	
75-25-2	Bromoform	ND	1.1	ND	0.10	
100-42-5	Styrene	ND	1.1	ND	0.25	
95-47-6	o-Xylene	ND	1.1	ND	0.25	
111-84-2	n-Nonane	1.5	1.1	0.29	0.20	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.21	ND	0.031	
98-82-8	Cumene	ND	1.1	ND	0.22	
80-56-8	alpha-Pinene	3.8	1.1	0.69	0.19	
103-65-1	n-Propylbenzene	ND	1.1	ND	0.22	
622-96-8	4-Ethyltoluene	ND	1.1	ND	0.22	
108-67-8	1,3,5-Trimethylbenzene	ND	1.1	ND	0.22	
95-63-6	1,2,4-Trimethylbenzene	ND	1.1	ND	0.22	
100-44-7	Benzyl Chloride	ND	1.1	ND	0.21	
541-73-1	1,3-Dichlorobenzene	ND	0.21	ND	0.035	
106-46-7	1,4-Dichlorobenzene	ND	0.21	ND	0.035	
95-50-1	1,2-Dichlorobenzene	ND	0.21	ND	0.035	
5989-27-5	d-Limonene	3.0	1.1	0.53	0.19	
96-12-8	1,2-Dibromo-3-chloropropane	ND	1.1	ND	0.11	
120-82-1	1,2,4-Trichlorobenzene	ND	1.1	ND	0.14	
91-20-3	Naphthalene	ND	1.1	ND	0.20	
87-68-3	Hexachlorobutadiene	ND	1.1	ND	0.10	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-P4-041013

CAS Project ID: P1301523

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1301523-004

Test Code: EPA TO-15

Date Collected: 4/10/13

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: 4/11/13

Analyst: Simon Cao

Date Analyzed: 4/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AS00403

Initial Pressure (psig): -2.14 Final Pressure (psig): 3.74

Canister Dilution Factor: 1.47

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	3.5	0.74	2.0	0.43	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.1	0.74	0.43	0.15	
74-87-3	Chloromethane	0.44	0.29	0.21	0.14	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.74	ND	0.11	
75-01-4	Vinyl Chloride	ND	0.15	ND	0.058	
106-99-0	1,3-Butadiene	ND	0.29	ND	0.13	
74-83-9	Bromomethane	ND	0.15	ND	0.038	
75-00-3	Chloroethane	ND	0.15	ND	0.056	
64-17-5	Ethanol	88	7.4	47	3.9	
75-05-8	Acetonitrile	1.3	0.74	0.80	0.44	
107-02-8	Acrolein	ND	2.9	ND	1.3	
67-64-1	Acetone	18	7.4	7.4	3.1	
75-69-4	Trichlorofluoromethane	1.1	0.15	0.20	0.026	
67-63-0	2-Propanol (Isopropyl Alcohol)	8.8	7.4	3.6	3.0	
107-13-1	Acrylonitrile	ND	0.74	ND	0.34	
75-35-4	1,1-Dichloroethene	ND	0.15	ND	0.037	
75-09-2	Methylene Chloride	0.96	0.74	0.28	0.21	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.15	ND	0.047	
76-13-1	Trichlorotrifluoroethane	0.56	0.15	0.073	0.019	
75-15-0	Carbon Disulfide	ND	7.4	ND	2.4	
156-60-5	trans-1,2-Dichloroethene	ND	0.15	ND	0.037	
75-34-3	1,1-Dichloroethane	ND	0.15	ND	0.036	
1634-04-4	Methyl tert-Butyl Ether	ND	0.15	ND	0.041	
108-05-4	Vinyl Acetate	ND	7.4	ND	2.1	
78-93-3	2-Butanone (MEK)	ND	7.4	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-P4-041013

CAS Project ID: P1301523

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1301523-004

Test Code: EPA TO-15

Date Collected: 4/10/13

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: 4/11/13

Analyst: Simon Cao

Date Analyzed: 4/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AS00403

Initial Pressure (psig): -2.14 Final Pressure (psig): 3.74

Canister Dilution Factor: 1.47

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.15	ND	0.037	
141-78-6	Ethyl Acetate	24	1.5	6.7	0.41	
110-54-3	n-Hexane	0.99	0.74	0.28	0.21	
67-66-3	Chloroform	0.21	0.15	0.043	0.030	
109-99-9	Tetrahydrofuran (THF)	ND	0.74	ND	0.25	
107-06-2	1,2-Dichloroethane	ND	0.15	ND	0.036	
71-55-6	1,1,1-Trichloroethane	ND	0.15	ND	0.027	
71-43-2	Benzene	1.3	0.15	0.40	0.046	
56-23-5	Carbon Tetrachloride	0.55	0.15	0.088	0.023	
110-82-7	Cyclohexane	ND	1.5	ND	0.43	
78-87-5	1,2-Dichloropropane	ND	0.15	ND	0.032	
75-27-4	Bromodichloromethane	ND	0.15	ND	0.022	
79-01-6	Trichloroethene	ND	0.15	ND	0.027	
123-91-1	1,4-Dioxane	ND	0.74	ND	0.20	
80-62-6	Methyl Methacrylate	ND	1.5	ND	0.36	
142-82-5	n-Heptane	ND	0.74	ND	0.18	
10061-01-5	cis-1,3-Dichloropropene	ND	0.74	ND	0.16	
108-10-1	4-Methyl-2-pentanone	3.9	0.74	0.95	0.18	
10061-02-6	trans-1,3-Dichloropropene	ND	0.74	ND	0.16	
79-00-5	1,1,2-Trichloroethane	ND	0.15	ND	0.027	
108-88-3	Toluene	3.3	0.74	0.86	0.20	
591-78-6	2-Hexanone	ND	0.74	ND	0.18	
124-48-1	Dibromochloromethane	ND	0.15	ND	0.017	
106-93-4	1,2-Dibromoethane	ND	0.15	ND	0.019	
123-86-4	n-Butyl Acetate	ND	0.74	ND	0.15	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P4-041013
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1301523
 CAS Sample ID: P1301523-004

Test Code:	EPA TO-15	Date Collected:	4/10/13
Instrument ID:	Tekmar AUTOCAN/HP5973/HP6890/MS3	Date Received:	4/11/13
Analyst:	Simon Cao	Date Analyzed:	4/16/13
Sample Type:	6.0 L Summa Canister	Volume(s) Analyzed:	1.00 Liter(s)
Test Notes:			
Container ID:	AS00403		

Initial Pressure (psig): -2.14 Final Pressure (psig): 3.74

Canister Dilution Factor: 1.47

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.74	ND	0.16	
127-18-4	Tetrachloroethene	0.19	0.15	0.028	0.022	
108-90-7	Chlorobenzene	ND	0.15	ND	0.032	
100-41-4	Ethylbenzene	ND	0.74	ND	0.17	
179601-23-1	m,p-Xylenes	1.5	0.74	0.35	0.17	
75-25-2	Bromoform	ND	0.74	ND	0.071	
100-42-5	Styrene	ND	0.74	ND	0.17	
95-47-6	o-Xylene	ND	0.74	ND	0.17	
111-84-2	n-Nonane	ND	0.74	ND	0.14	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.15	ND	0.021	
98-82-8	Cumene	ND	0.74	ND	0.15	
80-56-8	alpha-Pinene	ND	0.74	ND	0.13	
103-65-1	n-Propylbenzene	ND	0.74	ND	0.15	
622-96-8	4-Ethyltoluene	ND	0.74	ND	0.15	
108-67-8	1,3,5-Trimethylbenzene	ND	0.74	ND	0.15	
95-63-6	1,2,4-Trimethylbenzene	ND	0.74	ND	0.15	
100-44-7	Benzyl Chloride	ND	0.74	ND	0.14	
541-73-1	1,3-Dichlorobenzene	ND	0.15	ND	0.024	
106-46-7	1,4-Dichlorobenzene	ND	0.15	ND	0.024	
95-50-1	1,2-Dichlorobenzene	ND	0.15	ND	0.024	
5989-27-5	d-Limonene	ND	0.74	ND	0.13	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.74	ND	0.076	
120-82-1	1,2,4-Trichlorobenzene	ND	0.74	ND	0.099	
91-20-3	Naphthalene	ND	0.74	ND	0.14	
87-68-3	Hexachlorobutadiene	ND	0.74	ND	0.069	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-P5-041013

CAS Project ID: P1301523

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1301523-005

Test Code: EPA TO-15

Date Collected: 4/10/13

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: 4/11/13

Analyst: Simon Cao

Date Analyzed: 4/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01644

Initial Pressure (psig): -2.41 Final Pressure (psig): 3.58

Canister Dilution Factor: 1.49

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	2.5	0.75	1.5	0.43	
75-71-8	Dichlorodifluoromethane (CFC 12)	1.9	0.75	0.39	0.15	
74-87-3	Chloromethane	0.34	0.30	0.16	0.14	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.75	ND	0.11	
75-01-4	Vinyl Chloride	ND	0.15	ND	0.058	
106-99-0	1,3-Butadiene	ND	0.30	ND	0.13	
74-83-9	Bromomethane	ND	0.15	ND	0.038	
75-00-3	Chloroethane	ND	0.15	ND	0.056	
64-17-5	Ethanol	45	7.5	24	4.0	
75-05-8	Acetonitrile	1.7	0.75	1.0	0.44	
107-02-8	Acrolein	ND	3.0	ND	1.3	
67-64-1	Acetone	20	7.5	8.6	3.1	
75-69-4	Trichlorofluoromethane	1.0	0.15	0.18	0.027	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	7.5	ND	3.0	
107-13-1	Acrylonitrile	ND	0.75	ND	0.34	
75-35-4	1,1-Dichloroethene	ND	0.15	ND	0.038	
75-09-2	Methylene Chloride	0.87	0.75	0.25	0.21	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.15	ND	0.048	
76-13-1	Trichlorotrifluoroethane	0.51	0.15	0.067	0.019	
75-15-0	Carbon Disulfide	ND	7.5	ND	2.4	
156-60-5	trans-1,2-Dichloroethene	ND	0.15	ND	0.038	
75-34-3	1,1-Dichloroethane	ND	0.15	ND	0.037	
1634-04-4	Methyl tert-Butyl Ether	ND	0.15	ND	0.041	
108-05-4	Vinyl Acetate	ND	7.5	ND	2.1	
78-93-3	2-Butanone (MEK)	ND	7.5	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 2 of 3

Client: CH2M Hill

Client Sample ID: PZAA-P5-041013

CAS Project ID: P1301523

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1301523-005

Test Code: EPA TO-15

Date Collected: 4/10/13

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: 4/11/13

Analyst: Simon Cao

Date Analyzed: 4/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01644

Initial Pressure (psig): -2.41 Final Pressure (psig): 3.58

Canister Dilution Factor: 1.49

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.15	ND	0.038	
141-78-6	Ethyl Acetate	4.2	1.5	1.2	0.41	
110-54-3	n-Hexane	ND	0.75	ND	0.21	
67-66-3	Chloroform	0.56	0.15	0.11	0.031	
109-99-9	Tetrahydrofuran (THF)	ND	0.75	ND	0.25	
107-06-2	1,2-Dichloroethane	ND	0.15	ND	0.037	
71-55-6	1,1,1-Trichloroethane	ND	0.15	ND	0.027	
71-43-2	Benzene	1.1	0.15	0.33	0.047	
56-23-5	Carbon Tetrachloride	0.49	0.15	0.078	0.024	
110-82-7	Cyclohexane	ND	1.5	ND	0.43	
78-87-5	1,2-Dichloropropane	ND	0.15	ND	0.032	
75-27-4	Bromodichloromethane	0.20	0.15	0.030	0.022	
79-01-6	Trichloroethene	ND	0.15	ND	0.028	
123-91-1	1,4-Dioxane	ND	0.75	ND	0.21	
80-62-6	Methyl Methacrylate	ND	1.5	ND	0.36	
142-82-5	n-Heptane	ND	0.75	ND	0.18	
10061-01-5	cis-1,3-Dichloropropene	ND	0.75	ND	0.16	
108-10-1	4-Methyl-2-pentanone	ND	0.75	ND	0.18	
10061-02-6	trans-1,3-Dichloropropene	ND	0.75	ND	0.16	
79-00-5	1,1,2-Trichloroethane	ND	0.15	ND	0.027	
108-88-3	Toluene	2.3	0.75	0.62	0.20	
591-78-6	2-Hexanone	ND	0.75	ND	0.18	
124-48-1	Dibromochloromethane	ND	0.15	ND	0.017	
106-93-4	1,2-Dibromoethane	ND	0.15	ND	0.019	
123-86-4	n-Butyl Acetate	ND	0.75	ND	0.16	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill **CAS Project ID:** P1301523
Client Sample ID: PZAA-P5-041013 **CAS Sample ID:** P1301523-005
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

Test Code: EPA TO-15 Date Collected: 4/10/13
 Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3 Date Received: 4/11/13
 Analyst: Simon Cao Date Analyzed: 4/16/13
 Sample Type: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
 Test Notes:
 Container ID: AC01644

Initial Pressure (psig): -2.41 Final Pressure (psig): 3.58

Canister Dilution Factor: 1.49

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.75	ND	0.16	
127-18-4	Tetrachloroethene	ND	0.15	ND	0.022	
108-90-7	Chlorobenzene	ND	0.15	ND	0.032	
100-41-4	Ethylbenzene	ND	0.75	ND	0.17	
179601-23-1	m,p-Xylenes	1.2	0.75	0.28	0.17	
75-25-2	Bromoform	ND	0.75	ND	0.072	
100-42-5	Styrene	ND	0.75	ND	0.18	
95-47-6	o-Xylene	ND	0.75	ND	0.17	
111-84-2	n-Nonane	ND	0.75	ND	0.14	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.15	ND	0.022	
98-82-8	Cumene	ND	0.75	ND	0.15	
80-56-8	alpha-Pinene	ND	0.75	ND	0.13	
103-65-1	n-Propylbenzene	ND	0.75	ND	0.15	
622-96-8	4-Ethyltoluene	ND	0.75	ND	0.15	
108-67-8	1,3,5-Trimethylbenzene	ND	0.75	ND	0.15	
95-63-6	1,2,4-Trimethylbenzene	ND	0.75	ND	0.15	
100-44-7	Benzyl Chloride	ND	0.75	ND	0.14	
541-73-1	1,3-Dichlorobenzene	ND	0.15	ND	0.025	
106-46-7	1,4-Dichlorobenzene	ND	0.15	ND	0.025	
95-50-1	1,2-Dichlorobenzene	ND	0.15	ND	0.025	
5989-27-5	d-Limonene	ND	0.75	ND	0.13	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.75	ND	0.077	
120-82-1	1,2,4-Trichlorobenzene	ND	0.75	ND	0.10	
91-20-3	Naphthalene	ND	0.75	ND	0.14	
87-68-3	Hexachlorobutadiene	ND	0.75	ND	0.070	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-P6-041013

CAS Project ID: P1301523

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1301523-006

Test Code: EPA TO-15

Date Collected: 4/10/13

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: 4/11/13

Analyst: Simon Cao

Date Analyzed: 4/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AS00123

Initial Pressure (psig): -2.45 Final Pressure (psig): 3.62

Canister Dilution Factor: 1.50

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	1.1	0.75	0.64	0.44	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.2	0.75	0.44	0.15	
74-87-3	Chloromethane	0.45	0.30	0.22	0.15	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.75	ND	0.11	
75-01-4	Vinyl Chloride	ND	0.15	ND	0.059	
106-99-0	1,3-Butadiene	ND	0.30	ND	0.14	
74-83-9	Bromomethane	0.15	0.15	0.039	0.039	
75-00-3	Chloroethane	ND	0.15	ND	0.057	
64-17-5	Ethanol	15	7.5	7.8	4.0	
75-05-8	Acetonitrile	1.5	0.75	0.90	0.45	
107-02-8	Acrolein	ND	3.0	ND	1.3	
67-64-1	Acetone	14	7.5	6.1	3.2	
75-69-4	Trichlorofluoromethane	1.2	0.15	0.21	0.027	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	7.5	ND	3.1	
107-13-1	Acrylonitrile	ND	0.75	ND	0.35	
75-35-4	1,1-Dichloroethene	ND	0.15	ND	0.038	
75-09-2	Methylene Chloride	0.86	0.75	0.25	0.22	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.15	ND	0.048	
76-13-1	Trichlorotrifluoroethane	0.57	0.15	0.074	0.020	
75-15-0	Carbon Disulfide	ND	7.5	ND	2.4	
156-60-5	trans-1,2-Dichloroethene	ND	0.15	ND	0.038	
75-34-3	1,1-Dichloroethane	ND	0.15	ND	0.037	
1634-04-4	Methyl tert-Butyl Ether	ND	0.15	ND	0.042	
108-05-4	Vinyl Acetate	ND	7.5	ND	2.1	
78-93-3	2-Butanone (MEK)	ND	7.5	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-P6-041013

CAS Project ID: P1301523

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1301523-006

Test Code: EPA TO-15

Date Collected: 4/10/13

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: 4/11/13

Analyst: Simon Cao

Date Analyzed: 4/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AS00123

Initial Pressure (psig): -2.45 Final Pressure (psig): 3.62

Canister Dilution Factor: 1.50

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.15	ND	0.038	
141-78-6	Ethyl Acetate	9.5	1.5	2.6	0.42	
110-54-3	n-Hexane	ND	0.75	ND	0.21	
67-66-3	Chloroform	0.59	0.15	0.12	0.031	
109-99-9	Tetrahydrofuran (THF)	ND	0.75	ND	0.25	
107-06-2	1,2-Dichloroethane	ND	0.15	ND	0.037	
71-55-6	1,1,1-Trichloroethane	ND	0.15	ND	0.028	
71-43-2	Benzene	1.2	0.15	0.38	0.047	
56-23-5	Carbon Tetrachloride	0.50	0.15	0.079	0.024	
110-82-7	Cyclohexane	ND	1.5	ND	0.44	
78-87-5	1,2-Dichloropropane	ND	0.15	ND	0.032	
75-27-4	Bromodichloromethane	0.20	0.15	0.029	0.022	
79-01-6	Trichloroethene	ND	0.15	ND	0.028	
123-91-1	1,4-Dioxane	ND	0.75	ND	0.21	
80-62-6	Methyl Methacrylate	ND	1.5	ND	0.37	
142-82-5	n-Heptane	ND	0.75	ND	0.18	
10061-01-5	cis-1,3-Dichloropropene	ND	0.75	ND	0.17	
108-10-1	4-Methyl-2-pentanone	ND	0.75	ND	0.18	
10061-02-6	trans-1,3-Dichloropropene	ND	0.75	ND	0.17	
79-00-5	1,1,2-Trichloroethane	ND	0.15	ND	0.028	
108-88-3	Toluene	2.1	0.75	0.55	0.20	
591-78-6	2-Hexanone	ND	0.75	ND	0.18	
124-48-1	Dibromochloromethane	ND	0.15	ND	0.018	
106-93-4	1,2-Dibromoethane	ND	0.15	ND	0.020	
123-86-4	n-Butyl Acetate	ND	0.75	ND	0.16	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-P6-041013
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1301523
 CAS Sample ID: P1301523-006

Test Code:	EPA TO-15	Date Collected:	4/10/13
Instrument ID:	Tekmar AUTOCAN/HP5973/HP6890/MS3	Date Received:	4/11/13
Analyst:	Simon Cao	Date Analyzed:	4/16/13
Sample Type:	6.0 L Summa Canister	Volume(s) Analyzed:	1.00 Liter(s)
Test Notes:			
Container ID:	AS00123		

Initial Pressure (psig): -2.45 Final Pressure (psig): 3.62

Canister Dilution Factor: 1.50

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.75	ND	0.16	
127-18-4	Tetrachloroethene	ND	0.15	ND	0.022	
108-90-7	Chlorobenzene	ND	0.15	ND	0.033	
100-41-4	Ethylbenzene	ND	0.75	ND	0.17	
179601-23-1	m,p-Xylenes	0.90	0.75	0.21	0.17	
75-25-2	Bromoform	ND	0.75	ND	0.073	
100-42-5	Styrene	ND	0.75	ND	0.18	
95-47-6	o-Xylene	ND	0.75	ND	0.17	
111-84-2	n-Nonane	ND	0.75	ND	0.14	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.15	ND	0.022	
98-82-8	Cumene	ND	0.75	ND	0.15	
80-56-8	alpha-Pinene	ND	0.75	ND	0.13	
103-65-1	n-Propylbenzene	ND	0.75	ND	0.15	
622-96-8	4-Ethyltoluene	ND	0.75	ND	0.15	
108-67-8	1,3,5-Trimethylbenzene	ND	0.75	ND	0.15	
95-63-6	1,2,4-Trimethylbenzene	ND	0.75	ND	0.15	
100-44-7	Benzyl Chloride	ND	0.75	ND	0.14	
541-73-1	1,3-Dichlorobenzene	ND	0.15	ND	0.025	
106-46-7	1,4-Dichlorobenzene	ND	0.15	ND	0.025	
95-50-1	1,2-Dichlorobenzene	ND	0.15	ND	0.025	
5989-27-5	d-Limonene	ND	0.75	ND	0.13	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.75	ND	0.078	
120-82-1	1,2,4-Trichlorobenzene	ND	0.75	ND	0.10	
91-20-3	Naphthalene	ND	0.75	ND	0.14	
87-68-3	Hexachlorobutadiene	ND	0.75	ND	0.070	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-P7-041013

CAS Project ID: P1301523

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1301523-007

Test Code: EPA TO-15

Date Collected: 4/10/13

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: 4/11/13

Analyst: Simon Cao

Date Analyzed: 4/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01588

Initial Pressure (psig): -3.00 Final Pressure (psig): 3.52

Canister Dilution Factor: 1.56

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	1.5	0.78	0.85	0.45	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.2	0.78	0.45	0.16	
74-87-3	Chloromethane	0.44	0.31	0.21	0.15	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.78	ND	0.11	
75-01-4	Vinyl Chloride	ND	0.16	ND	0.061	
106-99-0	1,3-Butadiene	ND	0.31	ND	0.14	
74-83-9	Bromomethane	ND	0.16	ND	0.040	
75-00-3	Chloroethane	ND	0.16	ND	0.059	
64-17-5	Ethanol	15	7.8	7.9	4.1	
75-05-8	Acetonitrile	ND	0.78	ND	0.46	
107-02-8	Acrolein	ND	3.1	ND	1.4	
67-64-1	Acetone	21	7.8	8.8	3.3	
75-69-4	Trichlorofluoromethane	1.2	0.16	0.21	0.028	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	7.8	ND	3.2	
107-13-1	Acrylonitrile	ND	0.78	ND	0.36	
75-35-4	1,1-Dichloroethene	ND	0.16	ND	0.039	
75-09-2	Methylene Chloride	ND	0.78	ND	0.22	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.16	ND	0.050	
76-13-1	Trichlorotrifluoroethane	0.58	0.16	0.076	0.020	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
156-60-5	trans-1,2-Dichloroethene	ND	0.16	ND	0.039	
75-34-3	1,1-Dichloroethane	ND	0.16	ND	0.039	
1634-04-4	Methyl tert-Butyl Ether	ND	0.16	ND	0.043	
108-05-4	Vinyl Acetate	ND	7.8	ND	2.2	
78-93-3	2-Butanone (MEK)	ND	7.8	ND	2.6	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-P7-041013

CAS Project ID: P1301523

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1301523-007

Test Code: EPA TO-15

Date Collected: 4/10/13

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: 4/11/13

Analyst: Simon Cao

Date Analyzed: 4/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01588

Initial Pressure (psig): -3.00 Final Pressure (psig): 3.52

Canister Dilution Factor: 1.56

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.16	ND	0.039	
141-78-6	Ethyl Acetate	2.9	1.6	0.81	0.43	
110-54-3	n-Hexane	ND	0.78	ND	0.22	
67-66-3	Chloroform	0.28	0.16	0.058	0.032	
109-99-9	Tetrahydrofuran (THF)	ND	0.78	ND	0.26	
107-06-2	1,2-Dichloroethane	ND	0.16	ND	0.039	
71-55-6	1,1,1-Trichloroethane	ND	0.16	ND	0.029	
71-43-2	Benzene	4.4	0.16	1.4	0.049	
56-23-5	Carbon Tetrachloride	0.50	0.16	0.079	0.025	
110-82-7	Cyclohexane	ND	1.6	ND	0.45	
78-87-5	1,2-Dichloropropane	ND	0.16	ND	0.034	
75-27-4	Bromodichloromethane	ND	0.16	ND	0.023	
79-01-6	Trichloroethene	ND	0.16	ND	0.029	
123-91-1	1,4-Dioxane	ND	0.78	ND	0.22	
80-62-6	Methyl Methacrylate	ND	1.6	ND	0.38	
142-82-5	n-Heptane	ND	0.78	ND	0.19	
10061-01-5	cis-1,3-Dichloropropene	ND	0.78	ND	0.17	
108-10-1	4-Methyl-2-pentanone	ND	0.78	ND	0.19	
10061-02-6	trans-1,3-Dichloropropene	ND	0.78	ND	0.17	
79-00-5	1,1,2-Trichloroethane	ND	0.16	ND	0.029	
108-88-3	Toluene	2.1	0.78	0.57	0.21	
591-78-6	2-Hexanone	ND	0.78	ND	0.19	
124-48-1	Dibromochloromethane	ND	0.16	ND	0.018	
106-93-4	1,2-Dibromoethane	ND	0.16	ND	0.020	
123-86-4	n-Butyl Acetate	ND	0.78	ND	0.16	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill **CAS Project ID:** P1301523
Client Sample ID: PZAA-P7-041013 **CAS Sample ID:** P1301523-007
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

Test Code: EPA TO-15 Date Collected: 4/10/13
 Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3 Date Received: 4/11/13
 Analyst: Simon Cao Date Analyzed: 4/16/13
 Sample Type: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
 Test Notes:
 Container ID: AC01588

Initial Pressure (psig): -3.00 Final Pressure (psig): 3.52

Canister Dilution Factor: 1.56

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.78	ND	0.17	
127-18-4	Tetrachloroethene	ND	0.16	ND	0.023	
108-90-7	Chlorobenzene	0.93	0.16	0.20	0.034	
100-41-4	Ethylbenzene	ND	0.78	ND	0.18	
179601-23-1	m,p-Xylenes	0.90	0.78	0.21	0.18	
75-25-2	Bromoform	ND	0.78	ND	0.075	
100-42-5	Styrene	ND	0.78	ND	0.18	
95-47-6	o-Xylene	ND	0.78	ND	0.18	
111-84-2	n-Nonane	ND	0.78	ND	0.15	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.16	ND	0.023	
98-82-8	Cumene	ND	0.78	ND	0.16	
80-56-8	alpha-Pinene	1.1	0.78	0.19	0.14	
103-65-1	n-Propylbenzene	ND	0.78	ND	0.16	
622-96-8	4-Ethyltoluene	ND	0.78	ND	0.16	
108-67-8	1,3,5-Trimethylbenzene	ND	0.78	ND	0.16	
95-63-6	1,2,4-Trimethylbenzene	ND	0.78	ND	0.16	
100-44-7	Benzyl Chloride	ND	0.78	ND	0.15	
541-73-1	1,3-Dichlorobenzene	ND	0.16	ND	0.026	
106-46-7	1,4-Dichlorobenzene	ND	0.16	ND	0.026	
95-50-1	1,2-Dichlorobenzene	0.16	0.16	0.027	0.026	
5989-27-5	d-Limonene	ND	0.78	ND	0.14	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.78	ND	0.081	
120-82-1	1,2,4-Trichlorobenzene	ND	0.78	ND	0.11	
91-20-3	Naphthalene	ND	0.78	ND	0.15	
87-68-3	Hexachlorobutadiene	ND	0.78	ND	0.073	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-P8-041013

CAS Project ID: P1301523

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1301523-008

Test Code: EPA TO-15

Date Collected: 4/10/13

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: 4/11/13

Analyst: Simon Cao

Date Analyzed: 4/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC00981

Initial Pressure (psig): -2.86 Final Pressure (psig): 3.56

Canister Dilution Factor: 1.54

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	1.1	0.77	0.67	0.45	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.5	0.77	0.50	0.16	
74-87-3	Chloromethane	0.58	0.31	0.28	0.15	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.77	ND	0.11	
75-01-4	Vinyl Chloride	ND	0.15	ND	0.060	
106-99-0	1,3-Butadiene	ND	0.31	ND	0.14	
74-83-9	Bromomethane	ND	0.15	ND	0.040	
75-00-3	Chloroethane	ND	0.15	ND	0.058	
64-17-5	Ethanol	100	7.7	54	4.1	
75-05-8	Acetonitrile	ND	0.77	ND	0.46	
107-02-8	Acrolein	ND	3.1	ND	1.3	
67-64-1	Acetone	21	7.7	8.8	3.2	
75-69-4	Trichlorofluoromethane	1.3	0.15	0.24	0.027	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	7.7	ND	3.1	
107-13-1	Acrylonitrile	ND	0.77	ND	0.35	
75-35-4	1,1-Dichloroethene	ND	0.15	ND	0.039	
75-09-2	Methylene Chloride	1.0	0.77	0.30	0.22	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.15	ND	0.049	
76-13-1	Trichlorotrifluoroethane	0.58	0.15	0.076	0.020	
75-15-0	Carbon Disulfide	ND	7.7	ND	2.5	
156-60-5	trans-1,2-Dichloroethene	ND	0.15	ND	0.039	
75-34-3	1,1-Dichloroethane	ND	0.15	ND	0.038	
1634-04-4	Methyl tert-Butyl Ether	ND	0.15	ND	0.043	
108-05-4	Vinyl Acetate	ND	7.7	ND	2.2	
78-93-3	2-Butanone (MEK)	ND	7.7	ND	2.6	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 2 of 3

Client: CH2M Hill

Client Sample ID: PZAA-P8-041013

CAS Project ID: P1301523

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1301523-008

Test Code: EPA TO-15

Date Collected: 4/10/13

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: 4/11/13

Analyst: Simon Cao

Date Analyzed: 4/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC00981

Initial Pressure (psig): -2.86 Final Pressure (psig): 3.56

Canister Dilution Factor: 1.54

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.15	ND	0.039	
141-78-6	Ethyl Acetate	18	1.5	4.9	0.43	
110-54-3	n-Hexane	0.88	0.77	0.25	0.22	
67-66-3	Chloroform	0.32	0.15	0.066	0.032	
109-99-9	Tetrahydrofuran (THF)	ND	0.77	ND	0.26	
107-06-2	1,2-Dichloroethane	ND	0.15	ND	0.038	
71-55-6	1,1,1-Trichloroethane	ND	0.15	ND	0.028	
71-43-2	Benzene	6.0	0.15	1.9	0.048	
56-23-5	Carbon Tetrachloride	0.39	0.15	0.062	0.024	
110-82-7	Cyclohexane	ND	1.5	ND	0.45	
78-87-5	1,2-Dichloropropane	ND	0.15	ND	0.033	
75-27-4	Bromodichloromethane	ND	0.15	ND	0.023	
79-01-6	Trichloroethene	ND	0.15	ND	0.029	
123-91-1	1,4-Dioxane	ND	0.77	ND	0.21	
80-62-6	Methyl Methacrylate	ND	1.5	ND	0.38	
142-82-5	n-Heptane	ND	0.77	ND	0.19	
10061-01-5	cis-1,3-Dichloropropene	ND	0.77	ND	0.17	
108-10-1	4-Methyl-2-pentanone	ND	0.77	ND	0.19	
10061-02-6	trans-1,3-Dichloropropene	ND	0.77	ND	0.17	
79-00-5	1,1,2-Trichloroethane	ND	0.15	ND	0.028	
108-88-3	Toluene	4.0	0.77	1.1	0.20	
591-78-6	2-Hexanone	ND	0.77	ND	0.19	
124-48-1	Dibromochloromethane	ND	0.15	ND	0.018	
106-93-4	1,2-Dibromoethane	ND	0.15	ND	0.020	
123-86-4	n-Butyl Acetate	ND	0.77	ND	0.16	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill **CAS Project ID:** P1301523
Client Sample ID: PZAA-P8-041013 **CAS Sample ID:** P1301523-008
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

Test Code:	EPA TO-15	Date Collected:	4/10/13
Instrument ID:	Tekmar AUTOCAN/HP5973/HP6890/MS3	Date Received:	4/11/13
Analyst:	Simon Cao	Date Analyzed:	4/16/13
Sample Type:	6.0 L Summa Canister	Volume(s) Analyzed:	1.00 Liter(s)
Test Notes:			
Container ID:	AC00981		

Initial Pressure (psig): -2.86 Final Pressure (psig): 3.56

Canister Dilution Factor: 1.54

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.77	ND	0.16	
127-18-4	Tetrachloroethene	0.18	0.15	0.026	0.023	
108-90-7	Chlorobenzene	0.22	0.15	0.048	0.033	
100-41-4	Ethylbenzene	ND	0.77	ND	0.18	
179601-23-1	m,p-Xylenes	1.4	0.77	0.33	0.18	
75-25-2	Bromoform	ND	0.77	ND	0.075	
100-42-5	Styrene	ND	0.77	ND	0.18	
95-47-6	o-Xylene	ND	0.77	ND	0.18	
111-84-2	n-Nonane	ND	0.77	ND	0.15	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.15	ND	0.022	
98-82-8	Cumene	ND	0.77	ND	0.16	
80-56-8	alpha-Pinene	1.7	0.77	0.31	0.14	
103-65-1	n-Propylbenzene	ND	0.77	ND	0.16	
622-96-8	4-Ethyltoluene	ND	0.77	ND	0.16	
108-67-8	1,3,5-Trimethylbenzene	ND	0.77	ND	0.16	
95-63-6	1,2,4-Trimethylbenzene	ND	0.77	ND	0.16	
100-44-7	Benzyl Chloride	ND	0.77	ND	0.15	
541-73-1	1,3-Dichlorobenzene	ND	0.15	ND	0.026	
106-46-7	1,4-Dichlorobenzene	ND	0.15	ND	0.026	
95-50-1	1,2-Dichlorobenzene	ND	0.15	ND	0.026	
5989-27-5	d-Limonene	1.3	0.77	0.22	0.14	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.77	ND	0.080	
120-82-1	1,2,4-Trichlorobenzene	ND	0.77	ND	0.10	
91-20-3	Naphthalene	0.78	0.77	0.15	0.15	
87-68-3	Hexachlorobutadiene	ND	0.77	ND	0.072	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C1-041013

CAS Project ID: P1301523

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1301523-009

Test Code: EPA TO-15

Date Collected: 4/10/13

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: 4/11/13

Analyst: Simon Cao

Date Analyzed: 4/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01183

Initial Pressure (psig): -2.20 Final Pressure (psig): 3.54

Canister Dilution Factor: 1.46

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	1.3	0.73	0.78	0.42	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.2	0.73	0.44	0.15	
74-87-3	Chloromethane	0.56	0.29	0.27	0.14	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.73	ND	0.10	
75-01-4	Vinyl Chloride	ND	0.15	ND	0.057	
106-99-0	1,3-Butadiene	ND	0.29	ND	0.13	
74-83-9	Bromomethane	ND	0.15	ND	0.038	
75-00-3	Chloroethane	ND	0.15	ND	0.055	
64-17-5	Ethanol	22	7.3	12	3.9	
75-05-8	Acetonitrile	2.6	0.73	1.5	0.43	
107-02-8	Acrolein	ND	2.9	ND	1.3	
67-64-1	Acetone	16	7.3	6.6	3.1	
75-69-4	Trichlorofluoromethane	1.1	0.15	0.20	0.026	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	7.3	ND	3.0	
107-13-1	Acrylonitrile	ND	0.73	ND	0.34	
75-35-4	1,1-Dichloroethene	ND	0.15	ND	0.037	
75-09-2	Methylene Chloride	1.2	0.73	0.34	0.21	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.15	ND	0.047	
76-13-1	Trichlorotrifluoroethane	0.57	0.15	0.075	0.019	
75-15-0	Carbon Disulfide	ND	7.3	ND	2.3	
156-60-5	trans-1,2-Dichloroethene	ND	0.15	ND	0.037	
75-34-3	1,1-Dichloroethane	ND	0.15	ND	0.036	
1634-04-4	Methyl tert-Butyl Ether	ND	0.15	ND	0.041	
108-05-4	Vinyl Acetate	ND	7.3	ND	2.1	
78-93-3	2-Butanone (MEK)	ND	7.3	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C1-041013

CAS Project ID: P1301523

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1301523-009

Test Code: EPA TO-15

Date Collected: 4/10/13

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: 4/11/13

Analyst: Simon Cao

Date Analyzed: 4/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01183

Initial Pressure (psig): -2.20 Final Pressure (psig): 3.54

Canister Dilution Factor: 1.46

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.15	ND	0.037	
141-78-6	Ethyl Acetate	1.8	1.5	0.49	0.41	
110-54-3	n-Hexane	0.87	0.73	0.25	0.21	
67-66-3	Chloroform	0.23	0.15	0.047	0.030	
109-99-9	Tetrahydrofuran (THF)	ND	0.73	ND	0.25	
107-06-2	1,2-Dichloroethane	ND	0.15	ND	0.036	
71-55-6	1,1,1-Trichloroethane	ND	0.15	ND	0.027	
71-43-2	Benzene	3.7	0.15	1.1	0.046	
56-23-5	Carbon Tetrachloride	0.50	0.15	0.079	0.023	
110-82-7	Cyclohexane	ND	1.5	ND	0.42	
78-87-5	1,2-Dichloropropane	ND	0.15	ND	0.032	
75-27-4	Bromodichloromethane	ND	0.15	ND	0.022	
79-01-6	Trichloroethene	ND	0.15	ND	0.027	
123-91-1	1,4-Dioxane	ND	0.73	ND	0.20	
80-62-6	Methyl Methacrylate	ND	1.5	ND	0.36	
142-82-5	n-Heptane	0.76	0.73	0.18	0.18	
10061-01-5	cis-1,3-Dichloropropene	ND	0.73	ND	0.16	
108-10-1	4-Methyl-2-pentanone	0.98	0.73	0.24	0.18	
10061-02-6	trans-1,3-Dichloropropene	ND	0.73	ND	0.16	
79-00-5	1,1,2-Trichloroethane	ND	0.15	ND	0.027	
108-88-3	Toluene	3.7	0.73	0.99	0.19	
591-78-6	2-Hexanone	ND	0.73	ND	0.18	
124-48-1	Dibromochloromethane	ND	0.15	ND	0.017	
106-93-4	1,2-Dibromoethane	ND	0.15	ND	0.019	
123-86-4	n-Butyl Acetate	ND	0.73	ND	0.15	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-C1-041013
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1301523
 CAS Sample ID: P1301523-009

Test Code:	EPA TO-15	Date Collected:	4/10/13
Instrument ID:	Tekmar AUTOCAN/HP5973/HP6890/MS3	Date Received:	4/11/13
Analyst:	Simon Cao	Date Analyzed:	4/16/13
Sample Type:	6.0 L Summa Canister	Volume(s) Analyzed:	1.00 Liter(s)
Test Notes:			
Container ID:	AC01183		

Initial Pressure (psig): -2.20 Final Pressure (psig): 3.54

Canister Dilution Factor: 1.46

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.73	ND	0.16	
127-18-4	Tetrachloroethene	0.15	0.15	0.022	0.022	
108-90-7	Chlorobenzene	ND	0.15	ND	0.032	
100-41-4	Ethylbenzene	ND	0.73	ND	0.17	
179601-23-1	m,p-Xylenes	1.4	0.73	0.33	0.17	
75-25-2	Bromoform	ND	0.73	ND	0.071	
100-42-5	Styrene	ND	0.73	ND	0.17	
95-47-6	o-Xylene	ND	0.73	ND	0.17	
111-84-2	n-Nonane	ND	0.73	ND	0.14	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.15	ND	0.021	
98-82-8	Cumene	ND	0.73	ND	0.15	
80-56-8	alpha-Pinene	ND	0.73	ND	0.13	
103-65-1	n-Propylbenzene	ND	0.73	ND	0.15	
622-96-8	4-Ethyltoluene	ND	0.73	ND	0.15	
108-67-8	1,3,5-Trimethylbenzene	ND	0.73	ND	0.15	
95-63-6	1,2,4-Trimethylbenzene	ND	0.73	ND	0.15	
100-44-7	Benzyl Chloride	ND	0.73	ND	0.14	
541-73-1	1,3-Dichlorobenzene	ND	0.15	ND	0.024	
106-46-7	1,4-Dichlorobenzene	ND	0.15	ND	0.024	
95-50-1	1,2-Dichlorobenzene	ND	0.15	ND	0.024	
5989-27-5	d-Limonene	ND	0.73	ND	0.13	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.73	ND	0.076	
120-82-1	1,2,4-Trichlorobenzene	ND	0.73	ND	0.098	
91-20-3	Naphthalene	ND	0.73	ND	0.14	
87-68-3	Hexachlorobutadiene	ND	0.73	ND	0.068	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C2-041013

CAS Project ID: P1301523

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1301523-010

Test Code: EPA TO-15

Date Collected: 4/10/13

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: 4/11/13

Analyst: Simon Cao

Date Analyzed: 4/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AS00391

Initial Pressure (psig): -3.40 Final Pressure (psig): 3.58

Canister Dilution Factor: 1.62

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	1.6	0.81	0.92	0.47	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.2	0.81	0.45	0.16	
74-87-3	Chloromethane	0.50	0.32	0.24	0.16	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.81	ND	0.12	
75-01-4	Vinyl Chloride	ND	0.16	ND	0.063	
106-99-0	1,3-Butadiene	ND	0.32	ND	0.15	
74-83-9	Bromomethane	ND	0.16	ND	0.042	
75-00-3	Chloroethane	ND	0.16	ND	0.061	
64-17-5	Ethanol	17	8.1	9.0	4.3	
75-05-8	Acetonitrile	2.6	0.81	1.5	0.48	
107-02-8	Acrolein	ND	3.2	ND	1.4	
67-64-1	Acetone	17	8.1	7.1	3.4	
75-69-4	Trichlorofluoromethane	1.2	0.16	0.21	0.029	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	8.1	ND	3.3	
107-13-1	Acrylonitrile	ND	0.81	ND	0.37	
75-35-4	1,1-Dichloroethene	ND	0.16	ND	0.041	
75-09-2	Methylene Chloride	1.1	0.81	0.32	0.23	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.16	ND	0.052	
76-13-1	Trichlorotrifluoroethane	0.57	0.16	0.074	0.021	
75-15-0	Carbon Disulfide	ND	8.1	ND	2.6	
156-60-5	trans-1,2-Dichloroethene	ND	0.16	ND	0.041	
75-34-3	1,1-Dichloroethane	ND	0.16	ND	0.040	
1634-04-4	Methyl tert-Butyl Ether	ND	0.16	ND	0.045	
108-05-4	Vinyl Acetate	ND	8.1	ND	2.3	
78-93-3	2-Butanone (MEK)	ND	8.1	ND	2.7	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C2-041013

CAS Project ID: P1301523

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1301523-010

Test Code: EPA TO-15

Date Collected: 4/10/13

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: 4/11/13

Analyst: Simon Cao

Date Analyzed: 4/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AS00391

Initial Pressure (psig): -3.40 Final Pressure (psig): 3.58

Canister Dilution Factor: 1.62

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.16	ND	0.041	
141-78-6	Ethyl Acetate	ND	1.6	ND	0.45	
110-54-3	n-Hexane	0.87	0.81	0.25	0.23	
67-66-3	Chloroform	0.25	0.16	0.052	0.033	
109-99-9	Tetrahydrofuran (THF)	ND	0.81	ND	0.27	
107-06-2	1,2-Dichloroethane	ND	0.16	ND	0.040	
71-55-6	1,1,1-Trichloroethane	ND	0.16	ND	0.030	
71-43-2	Benzene	3.1	0.16	0.97	0.051	
56-23-5	Carbon Tetrachloride	0.54	0.16	0.085	0.026	
110-82-7	Cyclohexane	ND	1.6	ND	0.47	
78-87-5	1,2-Dichloropropane	ND	0.16	ND	0.035	
75-27-4	Bromodichloromethane	ND	0.16	ND	0.024	
79-01-6	Trichloroethene	ND	0.16	ND	0.030	
123-91-1	1,4-Dioxane	ND	0.81	ND	0.22	
80-62-6	Methyl Methacrylate	ND	1.6	ND	0.40	
142-82-5	n-Heptane	ND	0.81	ND	0.20	
10061-01-5	cis-1,3-Dichloropropene	ND	0.81	ND	0.18	
108-10-1	4-Methyl-2-pentanone	ND	0.81	ND	0.20	
10061-02-6	trans-1,3-Dichloropropene	ND	0.81	ND	0.18	
79-00-5	1,1,2-Trichloroethane	ND	0.16	ND	0.030	
108-88-3	Toluene	3.3	0.81	0.88	0.22	
591-78-6	2-Hexanone	ND	0.81	ND	0.20	
124-48-1	Dibromochloromethane	ND	0.16	ND	0.019	
106-93-4	1,2-Dibromoethane	ND	0.16	ND	0.021	
123-86-4	n-Butyl Acetate	ND	0.81	ND	0.17	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill **CAS Project ID:** P1301523
Client Sample ID: PZAA-C2-041013 **CAS Sample ID:** P1301523-010
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

Test Code: EPA TO-15 Date Collected: 4/10/13
 Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3 Date Received: 4/11/13
 Analyst: Simon Cao Date Analyzed: 4/16/13
 Sample Type: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
 Test Notes:
 Container ID: AS00391

Initial Pressure (psig): -3.40 Final Pressure (psig): 3.58

Canister Dilution Factor: 1.62

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.81	ND	0.17	
127-18-4	Tetrachloroethene	ND	0.16	ND	0.024	
108-90-7	Chlorobenzene	ND	0.16	ND	0.035	
100-41-4	Ethylbenzene	ND	0.81	ND	0.19	
179601-23-1	m,p-Xylenes	1.3	0.81	0.31	0.19	
75-25-2	Bromoform	ND	0.81	ND	0.078	
100-42-5	Styrene	ND	0.81	ND	0.19	
95-47-6	o-Xylene	ND	0.81	ND	0.19	
111-84-2	n-Nonane	ND	0.81	ND	0.15	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.16	ND	0.024	
98-82-8	Cumene	ND	0.81	ND	0.16	
80-56-8	alpha-Pinene	ND	0.81	ND	0.15	
103-65-1	n-Propylbenzene	ND	0.81	ND	0.16	
622-96-8	4-Ethyltoluene	ND	0.81	ND	0.16	
108-67-8	1,3,5-Trimethylbenzene	ND	0.81	ND	0.16	
95-63-6	1,2,4-Trimethylbenzene	ND	0.81	ND	0.16	
100-44-7	Benzyl Chloride	ND	0.81	ND	0.16	
541-73-1	1,3-Dichlorobenzene	ND	0.16	ND	0.027	
106-46-7	1,4-Dichlorobenzene	ND	0.16	ND	0.027	
95-50-1	1,2-Dichlorobenzene	ND	0.16	ND	0.027	
5989-27-5	d-Limonene	ND	0.81	ND	0.15	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.81	ND	0.084	
120-82-1	1,2,4-Trichlorobenzene	ND	0.81	ND	0.11	
91-20-3	Naphthalene	ND	0.81	ND	0.15	
87-68-3	Hexachlorobutadiene	ND	0.81	ND	0.076	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C3-041013

CAS Project ID: P1301523

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1301523-011

Test Code: EPA TO-15

Date Collected: 4/10/13

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: 4/11/13

Analyst: Simon Cao

Date Analyzed: 4/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01955

Initial Pressure (psig): -1.72 Final Pressure (psig): 3.55

Canister Dilution Factor: 1.41

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	2.8	0.71	1.7	0.41	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.3	0.71	0.46	0.14	
74-87-3	Chloromethane	0.41	0.28	0.20	0.14	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.71	ND	0.10	
75-01-4	Vinyl Chloride	ND	0.14	ND	0.055	
106-99-0	1,3-Butadiene	ND	0.28	ND	0.13	
74-83-9	Bromomethane	ND	0.14	ND	0.036	
75-00-3	Chloroethane	ND	0.14	ND	0.053	
64-17-5	Ethanol	21	7.1	11	3.7	
75-05-8	Acetonitrile	3.3	0.71	2.0	0.42	
107-02-8	Acrolein	ND	2.8	ND	1.2	
67-64-1	Acetone	16	7.1	6.7	3.0	
75-69-4	Trichlorofluoromethane	1.2	0.14	0.22	0.025	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	7.1	ND	2.9	
107-13-1	Acrylonitrile	ND	0.71	ND	0.32	
75-35-4	1,1-Dichloroethene	ND	0.14	ND	0.036	
75-09-2	Methylene Chloride	1.5	0.71	0.42	0.20	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.14	ND	0.045	
76-13-1	Trichlorotrifluoroethane	0.61	0.14	0.079	0.018	
75-15-0	Carbon Disulfide	ND	7.1	ND	2.3	
156-60-5	trans-1,2-Dichloroethene	ND	0.14	ND	0.036	
75-34-3	1,1-Dichloroethane	ND	0.14	ND	0.035	
1634-04-4	Methyl tert-Butyl Ether	ND	0.14	ND	0.039	
108-05-4	Vinyl Acetate	ND	7.1	ND	2.0	
78-93-3	2-Butanone (MEK)	ND	7.1	ND	2.4	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C3-041013

CAS Project ID: P1301523

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1301523-011

Test Code: EPA TO-15

Date Collected: 4/10/13

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: 4/11/13

Analyst: Simon Cao

Date Analyzed: 4/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:

Container ID: AC01955

Initial Pressure (psig): -1.72 Final Pressure (psig): 3.55

Canister Dilution Factor: 1.41

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.14	ND	0.036	
141-78-6	Ethyl Acetate	3.8	1.4	1.0	0.39	
110-54-3	n-Hexane	0.97	0.71	0.28	0.20	
67-66-3	Chloroform	0.24	0.14	0.050	0.029	
109-99-9	Tetrahydrofuran (THF)	ND	0.71	ND	0.24	
107-06-2	1,2-Dichloroethane	ND	0.14	ND	0.035	
71-55-6	1,1,1-Trichloroethane	ND	0.14	ND	0.026	
71-43-2	Benzene	4.2	0.14	1.3	0.044	
56-23-5	Carbon Tetrachloride	0.54	0.14	0.085	0.022	
110-82-7	Cyclohexane	ND	1.4	ND	0.41	
78-87-5	1,2-Dichloropropane	ND	0.14	ND	0.031	
75-27-4	Bromodichloromethane	ND	0.14	ND	0.021	
79-01-6	Trichloroethene	ND	0.14	ND	0.026	
123-91-1	1,4-Dioxane	ND	0.71	ND	0.20	
80-62-6	Methyl Methacrylate	ND	1.4	ND	0.34	
142-82-5	n-Heptane	0.89	0.71	0.22	0.17	
10061-01-5	cis-1,3-Dichloropropene	ND	0.71	ND	0.16	
108-10-1	4-Methyl-2-pentanone	ND	0.71	ND	0.17	
10061-02-6	trans-1,3-Dichloropropene	ND	0.71	ND	0.16	
79-00-5	1,1,2-Trichloroethane	ND	0.14	ND	0.026	
108-88-3	Toluene	4.9	0.71	1.3	0.19	
591-78-6	2-Hexanone	ND	0.71	ND	0.17	
124-48-1	Dibromochloromethane	ND	0.14	ND	0.017	
106-93-4	1,2-Dibromoethane	ND	0.14	ND	0.018	
123-86-4	n-Butyl Acetate	ND	0.71	ND	0.15	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill **CAS Project ID:** P1301523
Client Sample ID: PZAA-C3-041013 **CAS Sample ID:** P1301523-011
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

Test Code: EPA TO-15 Date Collected: 4/10/13
 Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3 Date Received: 4/11/13
 Analyst: Simon Cao Date Analyzed: 4/16/13
 Sample Type: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
 Test Notes:
 Container ID: AC01955

Initial Pressure (psig): -1.72 Final Pressure (psig): 3.55

Canister Dilution Factor: 1.41

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.71	ND	0.15	
127-18-4	Tetrachloroethene	0.15	0.14	0.022	0.021	
108-90-7	Chlorobenzene	ND	0.14	ND	0.031	
100-41-4	Ethylbenzene	ND	0.71	ND	0.16	
179601-23-1	m,p-Xylenes	1.5	0.71	0.34	0.16	
75-25-2	Bromoform	ND	0.71	ND	0.068	
100-42-5	Styrene	ND	0.71	ND	0.17	
95-47-6	o-Xylene	ND	0.71	ND	0.16	
111-84-2	n-Nonane	ND	0.71	ND	0.13	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.14	ND	0.021	
98-82-8	Cumene	ND	0.71	ND	0.14	
80-56-8	alpha-Pinene	ND	0.71	ND	0.13	
103-65-1	n-Propylbenzene	ND	0.71	ND	0.14	
622-96-8	4-Ethyltoluene	ND	0.71	ND	0.14	
108-67-8	1,3,5-Trimethylbenzene	ND	0.71	ND	0.14	
95-63-6	1,2,4-Trimethylbenzene	ND	0.71	ND	0.14	
100-44-7	Benzyl Chloride	ND	0.71	ND	0.14	
541-73-1	1,3-Dichlorobenzene	ND	0.14	ND	0.023	
106-46-7	1,4-Dichlorobenzene	ND	0.14	ND	0.023	
95-50-1	1,2-Dichlorobenzene	ND	0.14	ND	0.023	
5989-27-5	d-Limonene	ND	0.71	ND	0.13	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.71	ND	0.073	
120-82-1	1,2,4-Trichlorobenzene	ND	0.71	ND	0.095	
91-20-3	Naphthalene	ND	0.71	ND	0.13	
87-68-3	Hexachlorobutadiene	ND	0.71	ND	0.066	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C4-041013

CAS Project ID: P1301523

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1301523-012

Test Code: EPA TO-15

Date Collected: 4/10/13

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: 4/11/13

Analyst: Simon Cao

Date Analyzed: 4/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01572

Initial Pressure (psig): -2.55 Final Pressure (psig): 3.61

Canister Dilution Factor: 1.51

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	1.4	0.76	0.84	0.44	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.3	0.76	0.47	0.15	
74-87-3	Chloromethane	0.53	0.30	0.26	0.15	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.76	ND	0.11	
75-01-4	Vinyl Chloride	ND	0.15	ND	0.059	
106-99-0	1,3-Butadiene	ND	0.30	ND	0.14	
74-83-9	Bromomethane	ND	0.15	ND	0.039	
75-00-3	Chloroethane	ND	0.15	ND	0.057	
64-17-5	Ethanol	18	7.6	9.7	4.0	
75-05-8	Acetonitrile	2.3	0.76	1.4	0.45	
107-02-8	Acrolein	ND	3.0	ND	1.3	
67-64-1	Acetone	15	7.6	6.3	3.2	
75-69-4	Trichlorofluoromethane	1.2	0.15	0.22	0.027	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	7.6	ND	3.1	
107-13-1	Acrylonitrile	ND	0.76	ND	0.35	
75-35-4	1,1-Dichloroethene	ND	0.15	ND	0.038	
75-09-2	Methylene Chloride	1.1	0.76	0.32	0.22	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.15	ND	0.048	
76-13-1	Trichlorotrifluoroethane	0.58	0.15	0.076	0.020	
75-15-0	Carbon Disulfide	ND	7.6	ND	2.4	
156-60-5	trans-1,2-Dichloroethene	ND	0.15	ND	0.038	
75-34-3	1,1-Dichloroethane	ND	0.15	ND	0.037	
1634-04-4	Methyl tert-Butyl Ether	ND	0.15	ND	0.042	
108-05-4	Vinyl Acetate	ND	7.6	ND	2.1	
78-93-3	2-Butanone (MEK)	ND	7.6	ND	2.6	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C4-041013

CAS Project ID: P1301523

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1301523-012

Test Code: EPA TO-15

Date Collected: 4/10/13

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: 4/11/13

Analyst: Simon Cao

Date Analyzed: 4/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01572

Initial Pressure (psig): -2.55 Final Pressure (psig): 3.61

Canister Dilution Factor: 1.51

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.15	ND	0.038	
141-78-6	Ethyl Acetate	2.1	1.5	0.57	0.42	
110-54-3	n-Hexane	0.89	0.76	0.25	0.21	
67-66-3	Chloroform	0.29	0.15	0.058	0.031	
109-99-9	Tetrahydrofuran (THF)	ND	0.76	ND	0.26	
107-06-2	1,2-Dichloroethane	ND	0.15	ND	0.037	
71-55-6	1,1,1-Trichloroethane	ND	0.15	ND	0.028	
71-43-2	Benzene	6.3	0.15	2.0	0.047	
56-23-5	Carbon Tetrachloride	0.48	0.15	0.076	0.024	
110-82-7	Cyclohexane	ND	1.5	ND	0.44	
78-87-5	1,2-Dichloropropane	ND	0.15	ND	0.033	
75-27-4	Bromodichloromethane	ND	0.15	ND	0.023	
79-01-6	Trichloroethene	ND	0.15	ND	0.028	
123-91-1	1,4-Dioxane	ND	0.76	ND	0.21	
80-62-6	Methyl Methacrylate	ND	1.5	ND	0.37	
142-82-5	n-Heptane	0.77	0.76	0.19	0.18	
10061-01-5	cis-1,3-Dichloropropene	ND	0.76	ND	0.17	
108-10-1	4-Methyl-2-pentanone	ND	0.76	ND	0.18	
10061-02-6	trans-1,3-Dichloropropene	ND	0.76	ND	0.17	
79-00-5	1,1,2-Trichloroethane	ND	0.15	ND	0.028	
108-88-3	Toluene	6.4	0.76	1.7	0.20	
591-78-6	2-Hexanone	ND	0.76	ND	0.18	
124-48-1	Dibromochloromethane	ND	0.15	ND	0.018	
106-93-4	1,2-Dibromoethane	ND	0.15	ND	0.020	
123-86-4	n-Butyl Acetate	ND	0.76	ND	0.16	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-C4-041013
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1301523
CAS Sample ID: P1301523-012

Test Code: EPA TO-15 Date Collected: 4/10/13
 Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3 Date Received: 4/11/13
 Analyst: Simon Cao Date Analyzed: 4/16/13
 Sample Type: 6.0 L Summa Canister Volume(s) Analyzed: 1.00 Liter(s)
 Test Notes:
 Container ID: AC01572

Initial Pressure (psig): -2.55 Final Pressure (psig): 3.61

Canister Dilution Factor: 1.51

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.76	ND	0.16	
127-18-4	Tetrachloroethene	ND	0.15	ND	0.022	
108-90-7	Chlorobenzene	ND	0.15	ND	0.033	
100-41-4	Ethylbenzene	ND	0.76	ND	0.17	
179601-23-1	m,p-Xylenes	1.6	0.76	0.37	0.17	
75-25-2	Bromoform	ND	0.76	ND	0.073	
100-42-5	Styrene	ND	0.76	ND	0.18	
95-47-6	o-Xylene	ND	0.76	ND	0.17	
111-84-2	n-Nonane	ND	0.76	ND	0.14	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.15	ND	0.022	
98-82-8	Cumene	ND	0.76	ND	0.15	
80-56-8	alpha-Pinene	ND	0.76	ND	0.14	
103-65-1	n-Propylbenzene	ND	0.76	ND	0.15	
622-96-8	4-Ethyltoluene	ND	0.76	ND	0.15	
108-67-8	1,3,5-Trimethylbenzene	ND	0.76	ND	0.15	
95-63-6	1,2,4-Trimethylbenzene	ND	0.76	ND	0.15	
100-44-7	Benzyl Chloride	ND	0.76	ND	0.15	
541-73-1	1,3-Dichlorobenzene	ND	0.15	ND	0.025	
106-46-7	1,4-Dichlorobenzene	ND	0.15	ND	0.025	
95-50-1	1,2-Dichlorobenzene	0.34	0.15	0.056	0.025	
5989-27-5	d-Limonene	ND	0.76	ND	0.14	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.76	ND	0.078	
120-82-1	1,2,4-Trichlorobenzene	ND	0.76	ND	0.10	
91-20-3	Naphthalene	ND	0.76	ND	0.14	
87-68-3	Hexachlorobutadiene	ND	0.76	ND	0.071	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: PZAA-C3-041013-D

CAS Project ID: P1301523

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1301523-013

Test Code: EPA TO-15

Date Collected: 4/10/13

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: 4/11/13

Analyst: Simon Cao

Date Analyzed: 4/19/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:

Container ID: AC01336

Initial Pressure (psig): -3.18 Final Pressure (psig): 3.53

Canister Dilution Factor: 1.58

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	1.5	0.79	0.89	0.46	
75-71-8	Dichlorodifluoromethane (CFC 12)	2.1	0.79	0.42	0.16	
74-87-3	Chloromethane	0.58	0.32	0.28	0.15	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.79	ND	0.11	
75-01-4	Vinyl Chloride	ND	0.16	ND	0.062	
106-99-0	1,3-Butadiene	ND	0.32	ND	0.14	
74-83-9	Bromomethane	ND	0.16	ND	0.041	
75-00-3	Chloroethane	ND	0.16	ND	0.060	
64-17-5	Ethanol	20	7.9	11	4.2	
75-05-8	Acetonitrile	2.6	0.79	1.5	0.47	
107-02-8	Acrolein	ND	3.2	ND	1.4	
67-64-1	Acetone	16	7.9	6.7	3.3	
75-69-4	Trichlorofluoromethane	1.1	0.16	0.20	0.028	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	7.9	ND	3.2	
107-13-1	Acrylonitrile	ND	0.79	ND	0.36	
75-35-4	1,1-Dichloroethene	ND	0.16	ND	0.040	
75-09-2	Methylene Chloride	1.2	0.79	0.35	0.23	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.16	ND	0.050	
76-13-1	Trichlorotrifluoroethane	0.55	0.16	0.072	0.021	
75-15-0	Carbon Disulfide	ND	7.9	ND	2.5	
156-60-5	trans-1,2-Dichloroethene	ND	0.16	ND	0.040	
75-34-3	1,1-Dichloroethane	ND	0.16	ND	0.039	
1634-04-4	Methyl tert-Butyl Ether	ND	0.16	ND	0.044	
108-05-4	Vinyl Acetate	ND	7.9	ND	2.2	
78-93-3	2-Butanone (MEK)	ND	7.9	ND	2.7	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 2 of 3

Client: CH2M Hill

Client Sample ID: PZAA-C3-041013-D

CAS Project ID: P1301523

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1301523-013

Test Code: EPA TO-15

Date Collected: 4/10/13

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: 4/11/13

Analyst: Simon Cao

Date Analyzed: 4/19/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:

Container ID: AC01336

Initial Pressure (psig): -3.18 Final Pressure (psig): 3.53

Canister Dilution Factor: 1.58

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.16	ND	0.040	
141-78-6	Ethyl Acetate	1.9	1.6	0.52	0.44	
110-54-3	n-Hexane	0.79	0.79	0.22	0.22	
67-66-3	Chloroform	0.21	0.16	0.042	0.032	
109-99-9	Tetrahydrofuran (THF)	ND	0.79	ND	0.27	
107-06-2	1,2-Dichloroethane	ND	0.16	ND	0.039	
71-55-6	1,1,1-Trichloroethane	ND	0.16	ND	0.029	
71-43-2	Benzene	4.0	0.16	1.2	0.049	
56-23-5	Carbon Tetrachloride	0.44	0.16	0.070	0.025	
110-82-7	Cyclohexane	ND	1.6	ND	0.46	
78-87-5	1,2-Dichloropropane	ND	0.16	ND	0.034	
75-27-4	Bromodichloromethane	ND	0.16	ND	0.024	
79-01-6	Trichloroethene	ND	0.16	ND	0.029	
123-91-1	1,4-Dioxane	ND	0.79	ND	0.22	
80-62-6	Methyl Methacrylate	ND	1.6	ND	0.39	
142-82-5	n-Heptane	ND	0.79	ND	0.19	
10061-01-5	cis-1,3-Dichloropropene	ND	0.79	ND	0.17	
108-10-1	4-Methyl-2-pentanone	ND	0.79	ND	0.19	
10061-02-6	trans-1,3-Dichloropropene	ND	0.79	ND	0.17	
79-00-5	1,1,2-Trichloroethane	ND	0.16	ND	0.029	
108-88-3	Toluene	4.2	0.79	1.1	0.21	
591-78-6	2-Hexanone	ND	0.79	ND	0.19	
124-48-1	Dibromochloromethane	ND	0.16	ND	0.019	
106-93-4	1,2-Dibromoethane	ND	0.16	ND	0.021	
123-86-4	n-Butyl Acetate	ND	0.79	ND	0.17	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: PZAA-C3-041013-D
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1301523
 CAS Sample ID: P1301523-013

Test Code:	EPA TO-15	Date Collected:	4/10/13
Instrument ID:	Tekmar AUTOCAN/HP5973/HP6890/MS3	Date Received:	4/11/13
Analyst:	Simon Cao	Date Analyzed:	4/19/13
Sample Type:	6.0 L Summa Canister	Volume(s) Analyzed:	1.00 Liter(s)
Test Notes:			
Container ID:	AC01336		

Initial Pressure (psig): -3.18 Final Pressure (psig): 3.53

Canister Dilution Factor: 1.58

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.79	ND	0.17	
127-18-4	Tetrachloroethene	ND	0.16	ND	0.023	
108-90-7	Chlorobenzene	ND	0.16	ND	0.034	
100-41-4	Ethylbenzene	ND	0.79	ND	0.18	
179601-23-1	m,p-Xylenes	1.4	0.79	0.33	0.18	
75-25-2	Bromoform	ND	0.79	ND	0.076	
100-42-5	Styrene	ND	0.79	ND	0.19	
95-47-6	o-Xylene	ND	0.79	ND	0.18	
111-84-2	n-Nonane	ND	0.79	ND	0.15	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.16	ND	0.023	
98-82-8	Cumene	ND	0.79	ND	0.16	
80-56-8	alpha-Pinene	ND	0.79	ND	0.14	
103-65-1	n-Propylbenzene	ND	0.79	ND	0.16	
622-96-8	4-Ethyltoluene	ND	0.79	ND	0.16	
108-67-8	1,3,5-Trimethylbenzene	ND	0.79	ND	0.16	
95-63-6	1,2,4-Trimethylbenzene	ND	0.79	ND	0.16	
100-44-7	Benzyl Chloride	ND	0.79	ND	0.15	
541-73-1	1,3-Dichlorobenzene	ND	0.16	ND	0.026	
106-46-7	1,4-Dichlorobenzene	ND	0.16	ND	0.026	
95-50-1	1,2-Dichlorobenzene	0.16	0.16	0.026	0.026	
5989-27-5	d-Limonene	ND	0.79	ND	0.14	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.79	ND	0.082	
120-82-1	1,2,4-Trichlorobenzene	ND	0.79	ND	0.11	
91-20-3	Naphthalene	ND	0.79	ND	0.15	
87-68-3	Hexachlorobutadiene	ND	0.79	ND	0.074	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: Method Blank

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1301523

CAS Sample ID: P130416-MB

Test Code: EPA TO-15

Date Collected: NA

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: NA

Analyst: Simon Cao

Date Analyzed: 4/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:

Canister Dilution Factor: 1.00

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	ND	0.50	ND	0.29	
75-71-8	Dichlorodifluoromethane (CFC 12)	ND	0.50	ND	0.10	
74-87-3	Chloromethane	ND	0.20	ND	0.097	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.50	ND	0.072	
75-01-4	Vinyl Chloride	ND	0.10	ND	0.039	
106-99-0	1,3-Butadiene	ND	0.20	ND	0.090	
74-83-9	Bromomethane	ND	0.10	ND	0.026	
75-00-3	Chloroethane	ND	0.10	ND	0.038	
64-17-5	Ethanol	ND	5.0	ND	2.7	
75-05-8	Acetonitrile	ND	0.50	ND	0.30	
107-02-8	Acrolein	ND	2.0	ND	0.87	
67-64-1	Acetone	ND	5.0	ND	2.1	
75-69-4	Trichlorofluoromethane	ND	0.10	ND	0.018	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	5.0	ND	2.0	
107-13-1	Acrylonitrile	ND	0.50	ND	0.23	
75-35-4	1,1-Dichloroethene	ND	0.10	ND	0.025	
75-09-2	Methylene Chloride	ND	0.50	ND	0.14	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.10	ND	0.032	
76-13-1	Trichlorotrifluoroethane	ND	0.10	ND	0.013	
75-15-0	Carbon Disulfide	ND	5.0	ND	1.6	
156-60-5	trans-1,2-Dichloroethene	ND	0.10	ND	0.025	
75-34-3	1,1-Dichloroethane	ND	0.10	ND	0.025	
1634-04-4	Methyl tert-Butyl Ether	ND	0.10	ND	0.028	
108-05-4	Vinyl Acetate	ND	5.0	ND	1.4	
78-93-3	2-Butanone (MEK)	ND	5.0	ND	1.7	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: Method Blank

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1301523

CAS Sample ID: P130416-MB

Test Code: EPA TO-15

Date Collected: NA

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: NA

Analyst: Simon Cao

Date Analyzed: 4/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:

Canister Dilution Factor: 1.00

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.10	ND	0.025	
141-78-6	Ethyl Acetate	ND	1.0	ND	0.28	
110-54-3	n-Hexane	ND	0.50	ND	0.14	
67-66-3	Chloroform	ND	0.10	ND	0.020	
109-99-9	Tetrahydrofuran (THF)	ND	0.50	ND	0.17	
107-06-2	1,2-Dichloroethane	ND	0.10	ND	0.025	
71-55-6	1,1,1-Trichloroethane	ND	0.10	ND	0.018	
71-43-2	Benzene	ND	0.10	ND	0.031	
56-23-5	Carbon Tetrachloride	ND	0.10	ND	0.016	
110-82-7	Cyclohexane	ND	1.0	ND	0.29	
78-87-5	1,2-Dichloropropane	ND	0.10	ND	0.022	
75-27-4	Bromodichloromethane	ND	0.10	ND	0.015	
79-01-6	Trichloroethene	ND	0.10	ND	0.019	
123-91-1	1,4-Dioxane	ND	0.50	ND	0.14	
80-62-6	Methyl Methacrylate	ND	1.0	ND	0.24	
142-82-5	n-Heptane	ND	0.50	ND	0.12	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	ND	0.11	
108-10-1	4-Methyl-2-pentanone	ND	0.50	ND	0.12	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	ND	0.11	
79-00-5	1,1,2-Trichloroethane	ND	0.10	ND	0.018	
108-88-3	Toluene	ND	0.50	ND	0.13	
591-78-6	2-Hexanone	ND	0.50	ND	0.12	
124-48-1	Dibromochloromethane	ND	0.10	ND	0.012	
106-93-4	1,2-Dibromoethane	ND	0.10	ND	0.013	
123-86-4	n-Butyl Acetate	ND	0.50	ND	0.11	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: Method Blank
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1301523
 CAS Sample ID: P130416-MB

Test Code:	EPA TO-15	Date Collected:	NA
Instrument ID:	Tekmar AUTOCAN/HP5973/HP6890/MS3	Date Received:	NA
Analyst:	Simon Cao	Date Analyzed:	4/16/13
Sample Type:	6.0 L Summa Canister	Volume(s) Analyzed:	1.00 Liter(s)
Test Notes:			

Canister Dilution Factor: 1.00

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.50	ND	0.11	
127-18-4	Tetrachloroethene	ND	0.10	ND	0.015	
108-90-7	Chlorobenzene	ND	0.10	ND	0.022	
100-41-4	Ethylbenzene	ND	0.50	ND	0.12	
179601-23-1	m,p-Xylenes	ND	0.50	ND	0.12	
75-25-2	Bromoform	ND	0.50	ND	0.048	
100-42-5	Styrene	ND	0.50	ND	0.12	
95-47-6	o-Xylene	ND	0.50	ND	0.12	
111-84-2	n-Nonane	ND	0.50	ND	0.095	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.10	ND	0.015	
98-82-8	Cumene	ND	0.50	ND	0.10	
80-56-8	alpha-Pinene	ND	0.50	ND	0.090	
103-65-1	n-Propylbenzene	ND	0.50	ND	0.10	
622-96-8	4-Ethyltoluene	ND	0.50	ND	0.10	
108-67-8	1,3,5-Trimethylbenzene	ND	0.50	ND	0.10	
95-63-6	1,2,4-Trimethylbenzene	ND	0.50	ND	0.10	
100-44-7	Benzyl Chloride	ND	0.50	ND	0.097	
541-73-1	1,3-Dichlorobenzene	ND	0.10	ND	0.017	
106-46-7	1,4-Dichlorobenzene	ND	0.10	ND	0.017	
95-50-1	1,2-Dichlorobenzene	ND	0.10	ND	0.017	
5989-27-5	d-Limonene	ND	0.50	ND	0.090	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.50	ND	0.052	
120-82-1	1,2,4-Trichlorobenzene	ND	0.50	ND	0.067	
91-20-3	Naphthalene	ND	0.50	ND	0.095	
87-68-3	Hexachlorobutadiene	ND	0.50	ND	0.047	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill

Client Sample ID: Method Blank

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1301523

CAS Sample ID: P130419-MB

Test Code: EPA TO-15

Date Collected: NA

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: NA

Analyst: Simon Cao

Date Analyzed: 4/19/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:

Canister Dilution Factor: 1.00

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
115-07-1	Propene	ND	0.50	ND	0.29	
75-71-8	Dichlorodifluoromethane (CFC 12)	ND	0.50	ND	0.10	
74-87-3	Chloromethane	ND	0.20	ND	0.097	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	0.50	ND	0.072	
75-01-4	Vinyl Chloride	ND	0.10	ND	0.039	
106-99-0	1,3-Butadiene	ND	0.20	ND	0.090	
74-83-9	Bromomethane	ND	0.10	ND	0.026	
75-00-3	Chloroethane	ND	0.10	ND	0.038	
64-17-5	Ethanol	ND	5.0	ND	2.7	
75-05-8	Acetonitrile	ND	0.50	ND	0.30	
107-02-8	Acrolein	ND	2.0	ND	0.87	
67-64-1	Acetone	ND	5.0	ND	2.1	
75-69-4	Trichlorofluoromethane	ND	0.10	ND	0.018	
67-63-0	2-Propanol (Isopropyl Alcohol)	ND	5.0	ND	2.0	
107-13-1	Acrylonitrile	ND	0.50	ND	0.23	
75-35-4	1,1-Dichloroethene	ND	0.10	ND	0.025	
75-09-2	Methylene Chloride	ND	0.50	ND	0.14	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	ND	0.10	ND	0.032	
76-13-1	Trichlorotrifluoroethane	ND	0.10	ND	0.013	
75-15-0	Carbon Disulfide	ND	5.0	ND	1.6	
156-60-5	trans-1,2-Dichloroethene	ND	0.10	ND	0.025	
75-34-3	1,1-Dichloroethane	ND	0.10	ND	0.025	
1634-04-4	Methyl tert-Butyl Ether	ND	0.10	ND	0.028	
108-05-4	Vinyl Acetate	ND	5.0	ND	1.4	
78-93-3	2-Butanone (MEK)	ND	5.0	ND	1.7	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: Method Blank
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1301523
 CAS Sample ID: P130419-MB

Test Code: EPA TO-15
 Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3
 Analyst: Simon Cao
 Sample Type: 6.0 L Summa Canister
 Test Notes:

Date Collected: NA
 Date Received: NA
 Date Analyzed: 4/19/13
 Volume(s) Analyzed: 1.00 Liter(s)

Canister Dilution Factor: 1.00

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	ND	0.10	ND	0.025	
141-78-6	Ethyl Acetate	ND	1.0	ND	0.28	
110-54-3	n-Hexane	ND	0.50	ND	0.14	
67-66-3	Chloroform	ND	0.10	ND	0.020	
109-99-9	Tetrahydrofuran (THF)	ND	0.50	ND	0.17	
107-06-2	1,2-Dichloroethane	ND	0.10	ND	0.025	
71-55-6	1,1,1-Trichloroethane	ND	0.10	ND	0.018	
71-43-2	Benzene	ND	0.10	ND	0.031	
56-23-5	Carbon Tetrachloride	ND	0.10	ND	0.016	
110-82-7	Cyclohexane	ND	1.0	ND	0.29	
78-87-5	1,2-Dichloropropane	ND	0.10	ND	0.022	
75-27-4	Bromodichloromethane	ND	0.10	ND	0.015	
79-01-6	Trichloroethene	ND	0.10	ND	0.019	
123-91-1	1,4-Dioxane	ND	0.50	ND	0.14	
80-62-6	Methyl Methacrylate	ND	1.0	ND	0.24	
142-82-5	n-Heptane	ND	0.50	ND	0.12	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	ND	0.11	
108-10-1	4-Methyl-2-pentanone	ND	0.50	ND	0.12	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	ND	0.11	
79-00-5	1,1,2-Trichloroethane	ND	0.10	ND	0.018	
108-88-3	Toluene	ND	0.50	ND	0.13	
591-78-6	2-Hexanone	ND	0.50	ND	0.12	
124-48-1	Dibromochloromethane	ND	0.10	ND	0.012	
106-93-4	1,2-Dibromoethane	ND	0.10	ND	0.013	
123-86-4	n-Butyl Acetate	ND	0.50	ND	0.11	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

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Client: CH2M Hill
Client Sample ID: Method Blank
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1301523
 CAS Sample ID: P130419-MB

Test Code:	EPA TO-15	Date Collected:	NA
Instrument ID:	Tekmar AUTOCAN/HP5973/HP6890/MS3	Date Received:	NA
Analyst:	Simon Cao	Date Analyzed:	4/19/13
Sample Type:	6.0 L Summa Canister	Volume(s) Analyzed:	1.00 Liter(s)
Test Notes:			

Canister Dilution Factor: 1.00

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
111-65-9	n-Octane	ND	0.50	ND	0.11	
127-18-4	Tetrachloroethene	ND	0.10	ND	0.015	
108-90-7	Chlorobenzene	ND	0.10	ND	0.022	
100-41-4	Ethylbenzene	ND	0.50	ND	0.12	
179601-23-1	m,p-Xylenes	ND	0.50	ND	0.12	
75-25-2	Bromoform	ND	0.50	ND	0.048	
100-42-5	Styrene	ND	0.50	ND	0.12	
95-47-6	o-Xylene	ND	0.50	ND	0.12	
111-84-2	n-Nonane	ND	0.50	ND	0.095	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.10	ND	0.015	
98-82-8	Cumene	ND	0.50	ND	0.10	
80-56-8	alpha-Pinene	ND	0.50	ND	0.090	
103-65-1	n-Propylbenzene	ND	0.50	ND	0.10	
622-96-8	4-Ethyltoluene	ND	0.50	ND	0.10	
108-67-8	1,3,5-Trimethylbenzene	ND	0.50	ND	0.10	
95-63-6	1,2,4-Trimethylbenzene	ND	0.50	ND	0.10	
100-44-7	Benzyl Chloride	ND	0.50	ND	0.097	
541-73-1	1,3-Dichlorobenzene	ND	0.10	ND	0.017	
106-46-7	1,4-Dichlorobenzene	ND	0.10	ND	0.017	
95-50-1	1,2-Dichlorobenzene	ND	0.10	ND	0.017	
5989-27-5	d-Limonene	ND	0.50	ND	0.090	
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.50	ND	0.052	
120-82-1	1,2,4-Trichlorobenzene	ND	0.50	ND	0.067	
91-20-3	Naphthalene	ND	0.50	ND	0.095	
87-68-3	Hexachlorobutadiene	ND	0.50	ND	0.047	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

SURROGATE SPIKE RECOVERY RESULTS

Page 1 of 1

Client: CH2M Hill

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1301523

Test Code: EPA TO-15

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date(s) Collected: 4/10/13

Analyst: Simon Cao

Date(s) Received: 4/11/13

Sample Type: 6.0 L Summa Canister(s)

Date(s) Analyzed: 4/16 - 4/19/13

Test Notes:

Client Sample ID	CAS Sample ID	1,2-Dichloroethane-d4	Toluene-d8	Bromofluorobenzene	Acceptance Limits	Data Qualifier
		Percent Recovered	Percent Recovered	Percent Recovered		
Method Blank	P130416-MB	92	102	105	70-130	
Method Blank	P130419-MB	92	101	109	70-130	
Lab Control Sample	P130416-LCS	92	101	110	70-130	
Lab Control Sample	P130419-LCS	91	99	112	70-130	
PZAA-P1-041013	P1301523-001	90	100	108	70-130	
PZAA-P2-041013	P1301523-002	92	100	108	70-130	
PZAA-P3-041013	P1301523-003	91	99	107	70-130	
PZAA-P4-041013	P1301523-004	92	98	108	70-130	
PZAA-P5-041013	P1301523-005	91	98	109	70-130	
PZAA-P6-041013	P1301523-006	92	97	109	70-130	
PZAA-P7-041013	P1301523-007	92	98	108	70-130	
PZAA-P8-041013	P1301523-008	92	98	108	70-130	
PZAA-C1-041013	P1301523-009	91	100	108	70-130	
PZAA-C2-041013	P1301523-010	93	99	108	70-130	
PZAA-C3-041013	P1301523-011	93	99	108	70-130	
PZAA-C4-041013	P1301523-012	92	100	108	70-130	
PZAA-C3-041013-D	P1301523-013	91	99	109	70-130	
PZAA-C3-041013-D	P1301523-013DUP	91	99	111	70-130	

Surrogate percent recovery is verified and accepted based on the on-column result.

Reported results are shown in concentration units and as a result of the calculation, may vary slightly from the on-column percent recovery.

LABORATORY CONTROL SAMPLE SUMMARY

Page 1 of 3

Client: CH2M Hill

Client Sample ID: Lab Control Sample

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1301523

CAS Sample ID: P130416-LCS

Test Code: EPA TO-15

Date Collected: NA

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: NA

Analyst: Simon Cao

Date Analyzed: 4/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 0.125 Liter(s)

Test Notes:

CAS #	Compound	Spike Amount µg/m³	Result µg/m³	% Recovery	CAS Acceptance Limits	Data Qualifier
115-07-1	Propene	204	185	91	58-139	
75-71-8	Dichlorodifluoromethane (CFC 12)	202	175	87	63-115	
74-87-3	Chloromethane	196	168	86	58-122	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	206	196	95	65-115	
75-01-4	Vinyl Chloride	200	182	91	64-122	
106-99-0	1,3-Butadiene	210	215	102	57-141	
74-83-9	Bromomethane	200	195	98	68-122	
75-00-3	Chloroethane	202	185	92	66-120	
64-17-5	Ethanol	958	949	99	58-126	
75-05-8	Acetonitrile	202	217	107	64-136	
107-02-8	Acrolein	204	195	96	58-129	
67-64-1	Acetone	1,040	913	88	60-114	
75-69-4	Trichlorofluoromethane	210	178	85	62-107	
67-63-0	2-Propanol (Isopropyl Alcohol)	396	312	79	54-118	
107-13-1	Acrylonitrile	206	211	102	72-143	
75-35-4	1,1-Dichloroethene	218	216	99	69-119	
75-09-2	Methylene Chloride	212	185	87	64-113	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	214	207	97	59-131	
76-13-1	Trichlorotrifluoroethane	212	212	100	69-117	
75-15-0	Carbon Disulfide	208	192	92	65-115	
156-60-5	trans-1,2-Dichloroethene	202	191	95	70-126	
75-34-3	1,1-Dichloroethane	206	187	91	68-116	
1634-04-4	Methyl tert-Butyl Ether	204	195	96	69-120	
108-05-4	Vinyl Acetate	988	1090	110	58-160	
78-93-3	2-Butanone (MEK)	212	213	100	70-127	

Laboratory Control Sample percent recovery is verified and accepted based on the on-column result.

Reported results are shown in concentration units and as a result of the calculation, may vary slightly.

LABORATORY CONTROL SAMPLE SUMMARY

Page 2 of 3

Client: CH2M Hill

Client Sample ID: Lab Control Sample

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1301523

CAS Sample ID: P130416-LCS

Test Code: EPA TO-15

Date Collected: NA

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: NA

Analyst: Simon Cao

Date Analyzed: 4/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 0.125 Liter(s)

Test Notes:

CAS #	Compound	Spike Amount µg/m³	Result µg/m³	% Recovery	CAS Acceptance Limits	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	214	197	92	70-119	
141-78-6	Ethyl Acetate	412	403	98	72-129	
110-54-3	n-Hexane	206	172	83	63-115	
67-66-3	Chloroform	222	197	89	68-110	
109-99-9	Tetrahydrofuran (THF)	208	212	102	60-126	
107-06-2	1,2-Dichloroethane	208	190	91	69-118	
71-55-6	1,1,1-Trichloroethane	204	203	100	68-120	
71-43-2	Benzene	208	201	97	69-117	
56-23-5	Carbon Tetrachloride	212	233	110	65-134	
110-82-7	Cyclohexane	402	374	93	69-114	
78-87-5	1,2-Dichloropropane	204	192	94	70-116	
75-27-4	Bromodichloromethane	204	222	109	71-126	
79-01-6	Trichloroethene	198	204	103	71-119	
123-91-1	1,4-Dioxane	206	230	112	72-126	
80-62-6	Methyl Methacrylate	414	486	117	75-136	
142-82-5	n-Heptane	202	195	97	70-117	
10061-01-5	cis-1,3-Dichloropropene	196	202	103	75-132	
108-10-1	4-Methyl-2-pentanone	210	204	97	70-133	
10061-02-6	trans-1,3-Dichloropropene	218	239	110	78-136	
79-00-5	1,1,2-Trichloroethane	202	212	105	72-119	
108-88-3	Toluene	208	205	99	65-116	
591-78-6	2-Hexanone	228	224	98	62-132	
124-48-1	Dibromochloromethane	216	283	131	66-140	
106-93-4	1,2-Dibromoethane	208	245	118	69-130	
123-86-4	n-Butyl Acetate	228	222	97	63-136	

Laboratory Control Sample percent recovery is verified and accepted based on the on-column result.
 Reported results are shown in concentration units and as a result of the calculation, may vary slightly.

LABORATORY CONTROL SAMPLE SUMMARY

Page 3 of 3

Client: CH2M Hill

Client Sample ID: Lab Control Sample

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1301523

CAS Sample ID: P130416-LCS

Test Code: EPA TO-15

Date Collected: NA

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: NA

Analyst: Simon Cao

Date Analyzed: 4/16/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 0.125 Liter(s)

Test Notes:

CAS #	Compound	Spike Amount µg/m³	Result µg/m³	% Recovery	CAS Acceptance Limits	Data Qualifier
111-65-9	n-Octane	206	196	95	66-118	
127-18-4	Tetrachloroethene	190	201	106	63-123	
108-90-7	Chlorobenzene	208	212	102	66-118	
100-41-4	Ethylbenzene	206	214	104	66-119	
179601-23-1	m,p-Xylenes	412	421	102	64-118	
75-25-2	Bromoform	216	257	119	64-140	
100-42-5	Styrene	208	235	113	68-132	
95-47-6	o-Xylene	200	207	104	65-120	
111-84-2	n-Nonane	202	188	93	64-117	
79-34-5	1,1,2,2-Tetrachloroethane	198	219	111	63-128	
98-82-8	Cumene	196	205	105	65-121	
80-56-8	alpha-Pinene	192	203	106	66-123	
103-65-1	n-Propylbenzene	198	212	107	65-121	
622-96-8	4-Ethyltoluene	204	228	112	64-122	
108-67-8	1,3,5-Trimethylbenzene	208	228	110	64-125	
95-63-6	1,2,4-Trimethylbenzene	200	233	117	64-131	
100-44-7	Benzyl Chloride	206	257	125	67-146	
541-73-1	1,3-Dichlorobenzene	206	245	119	64-130	
106-46-7	1,4-Dichlorobenzene	212	242	114	61-124	
95-50-1	1,2-Dichlorobenzene	204	241	118	63-126	
5989-27-5	d-Limonene	206	245	119	62-133	
96-12-8	1,2-Dibromo-3-chloropropane	202	266	132	62-155	
120-82-1	1,2,4-Trichlorobenzene	200	243	122	59-146	
91-20-3	Naphthalene	178	222	125	56-143	
87-68-3	Hexachlorobutadiene	208	260	125	58-133	

Laboratory Control Sample percent recovery is verified and accepted based on the on-column result.
 Reported results are shown in concentration units and as a result of the calculation, may vary slightly.

LABORATORY CONTROL SAMPLE SUMMARY

Page 1 of 3

Client: CH2M Hill

Client Sample ID: Lab Control Sample

CAS Project ID: P1301523

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P130419-LCS

Test Code: EPA TO-15

Date Collected: NA

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: NA

Analyst: Simon Cao

Date Analyzed: 4/19/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 0.125 Liter(s)

Test Notes:

CAS #	Compound	Spike Amount µg/m³	Result µg/m³	% Recovery	CAS Acceptance Limits	Data Qualifier
115-07-1	Propene	204	165	81	58-139	
75-71-8	Dichlorodifluoromethane (CFC 12)	202	161	80	63-115	
74-87-3	Chloromethane	196	155	79	58-122	
76-14-2	1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	206	183	89	65-115	
75-01-4	Vinyl Chloride	200	168	84	64-122	
106-99-0	1,3-Butadiene	210	199	95	57-141	
74-83-9	Bromomethane	200	182	91	68-122	
75-00-3	Chloroethane	202	171	85	66-120	
64-17-5	Ethanol	958	880	92	58-126	
75-05-8	Acetonitrile	202	200	99	64-136	
107-02-8	Acrolein	204	181	89	58-129	
67-64-1	Acetone	1,040	848	82	60-114	
75-69-4	Trichlorofluoromethane	210	164	78	62-107	
67-63-0	2-Propanol (Isopropyl Alcohol)	396	299	76	54-118	
107-13-1	Acrylonitrile	206	194	94	72-143	
75-35-4	1,1-Dichloroethene	218	200	92	69-119	
75-09-2	Methylene Chloride	212	172	81	64-113	
107-05-1	3-Chloro-1-propene (Allyl Chloride)	214	191	89	59-131	
76-13-1	Trichlorotrifluoroethane	212	196	92	69-117	
75-15-0	Carbon Disulfide	208	179	86	65-115	
156-60-5	trans-1,2-Dichloroethene	202	178	88	70-126	
75-34-3	1,1-Dichloroethane	206	175	85	68-116	
1634-04-4	Methyl tert-Butyl Ether	204	182	89	69-120	
108-05-4	Vinyl Acetate	988	998	101	58-160	
78-93-3	2-Butanone (MEK)	212	200	94	70-127	

Laboratory Control Sample percent recovery is verified and accepted based on the on-column result.

Reported results are shown in concentration units and as a result of the calculation, may vary slightly.

LABORATORY CONTROL SAMPLE SUMMARY

Page 2 of 3

Client: CH2M Hill

Client Sample ID: Lab Control Sample

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1301523

CAS Sample ID: P130419-LCS

Test Code: EPA TO-15

Date Collected: NA

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: NA

Analyst: Simon Cao

Date Analyzed: 4/19/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 0.125 Liter(s)

Test Notes:

CAS #	Compound	Spike Amount µg/m³	Result µg/m³	% Recovery	CAS Acceptance Limits	Data Qualifier
156-59-2	cis-1,2-Dichloroethene	214	183	86	70-119	
141-78-6	Ethyl Acetate	412	378	92	72-129	
110-54-3	n-Hexane	206	160	78	63-115	
67-66-3	Chloroform	222	183	82	68-110	
109-99-9	Tetrahydrofuran (THF)	208	196	94	60-126	
107-06-2	1,2-Dichloroethane	208	177	85	69-118	
71-55-6	1,1,1-Trichloroethane	204	188	92	68-120	
71-43-2	Benzene	208	186	89	69-117	
56-23-5	Carbon Tetrachloride	212	214	101	65-134	
110-82-7	Cyclohexane	402	348	87	69-114	
78-87-5	1,2-Dichloropropane	204	178	87	70-116	
75-27-4	Bromodichloromethane	204	206	101	71-126	
79-01-6	Trichloroethene	198	190	96	71-119	
123-91-1	1,4-Dioxane	206	215	104	72-126	
80-62-6	Methyl Methacrylate	414	449	108	75-136	
142-82-5	n-Heptane	202	180	89	70-117	
10061-01-5	cis-1,3-Dichloropropene	196	190	97	75-132	
108-10-1	4-Methyl-2-pentanone	210	187	89	70-133	
10061-02-6	trans-1,3-Dichloropropene	218	224	103	78-136	
79-00-5	1,1,2-Trichloroethane	202	196	97	72-119	
108-88-3	Toluene	208	189	91	65-116	
591-78-6	2-Hexanone	228	203	89	62-132	
124-48-1	Dibromochloromethane	216	259	120	66-140	
106-93-4	1,2-Dibromoethane	208	228	110	69-130	
123-86-4	n-Butyl Acetate	228	201	88	63-136	

Laboratory Control Sample percent recovery is verified and accepted based on the on-column result.
 Reported results are shown in concentration units and as a result of the calculation, may vary slightly.

LABORATORY CONTROL SAMPLE SUMMARY

Page 3 of 3

Client: CH2M Hill

Client Sample ID: Lab Control Sample

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1301523

CAS Sample ID: P130419-LCS

Test Code: EPA TO-15

Date Collected: NA

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: NA

Analyst: Simon Cao

Date Analyzed: 4/19/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 0.125 Liter(s)

Test Notes:

CAS #	Compound	Spike Amount µg/m³	Result µg/m³	% Recovery	CAS Acceptance Limits	Data Qualifier
111-65-9	n-Octane	206	179	87	66-118	
127-18-4	Tetrachloroethene	190	187	98	63-123	
108-90-7	Chlorobenzene	208	195	94	66-118	
100-41-4	Ethylbenzene	206	197	96	66-119	
179601-23-1	m,p-Xylenes	412	387	94	64-118	
75-25-2	Bromoform	216	239	111	64-140	
100-42-5	Styrene	208	216	104	68-132	
95-47-6	o-Xylene	200	190	95	65-120	
111-84-2	n-Nonane	202	172	85	64-117	
79-34-5	1,1,2,2-Tetrachloroethane	198	202	102	63-128	
98-82-8	Cumene	196	188	96	65-121	
80-56-8	alpha-Pinene	192	185	96	66-123	
103-65-1	n-Propylbenzene	198	195	98	65-121	
622-96-8	4-Ethyltoluene	204	211	103	64-122	
108-67-8	1,3,5-Trimethylbenzene	208	210	101	64-125	
95-63-6	1,2,4-Trimethylbenzene	200	213	107	64-131	
100-44-7	Benzyl Chloride	206	234	114	67-146	
541-73-1	1,3-Dichlorobenzene	206	226	110	64-130	
106-46-7	1,4-Dichlorobenzene	212	224	106	61-124	
95-50-1	1,2-Dichlorobenzene	204	223	109	63-126	
5989-27-5	d-Limonene	206	220	107	62-133	
96-12-8	1,2-Dibromo-3-chloropropane	202	244	121	62-155	
120-82-1	1,2,4-Trichlorobenzene	200	223	112	59-146	
91-20-3	Naphthalene	178	204	115	56-143	
87-68-3	Hexachlorobutadiene	208	240	115	58-133	

Laboratory Control Sample percent recovery is verified and accepted based on the on-column result.
 Reported results are shown in concentration units and as a result of the calculation, may vary slightly.

LABORATORY DUPLICATE SUMMARY RESULTS

Page 1 of 3

Client: CH2M Hill

Client Sample ID: PZAA-C3-041013-D

CAS Project ID: P1301523

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Sample ID: P1301523-013DUP

Test Code: EPA TO-15

Date Collected: 4/10/13

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: 4/11/13

Analyst: Simon Cao

Date Analyzed: 4/19/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:
Container ID: AC01336

Initial Pressure (psig): -3.18

Final Pressure (psig): 3.53

Canister Dilution Factor: 1.58

Compound	Sample Result		Duplicate Sample Result		Average µg/m³	% RPD	RPD Limit	Data Qualifier
	µg/m³	ppbV	µg/m³	ppbV				
Propene	1.54	0.894	1.50	0.871	1.52	3	25	
Dichlorodifluoromethane (CFC 12)	2.08	0.420	2.13	0.430	2.105	2	25	
Chloromethane	0.583	0.282	0.521	0.253	0.552	11	25	
1,2-Dichloro-1,1,2,2-tetrafluoroethane (CFC 114)	ND	ND	ND	ND	-	-	25	
Vinyl Chloride	ND	ND	ND	ND	-	-	25	
1,3-Butadiene	ND	ND	ND	ND	-	-	25	
Bromomethane	ND	ND	ND	ND	-	-	25	
Chloroethane	ND	ND	ND	ND	-	-	25	
Ethanol	20.1	10.7	20.4	10.8	20.25	1	25	
Acetonitrile	2.58	1.54	2.64	1.57	2.61	2	25	
Acrolein	ND	ND	ND	ND	-	-	25	
Acetone	15.8	6.67	16.5	6.94	16.15	4	25	
Trichlorofluoromethane	1.10	0.197	1.14	0.202	1.12	4	25	
2-Propanol (Isopropyl Alcohol)	ND	ND	ND	ND	-	-	25	
Acrylonitrile	ND	ND	ND	ND	-	-	25	
1,1-Dichloroethene	ND	ND	ND	ND	-	-	25	
Methylene Chloride	1.22	0.352	1.21	0.348	1.215	0.8	25	
3-Chloro-1-propene (Allyl Chloride)	ND	ND	ND	ND	-	-	25	
Trichlorotrifluoroethane	0.553	0.0722	0.570	0.0745	0.5615	3	25	
Carbon Disulfide	ND	ND	ND	ND	-	-	25	
trans-1,2-Dichloroethene	ND	ND	ND	ND	-	-	25	
1,1-Dichloroethane	ND	ND	ND	ND	-	-	25	
Methyl tert-Butyl Ether	ND	ND	ND	ND	-	-	25	
Vinyl Acetate	ND	ND	ND	ND	-	-	25	
2-Butanone (MEK)	ND	ND	ND	ND	-	-	25	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

LABORATORY DUPLICATE SUMMARY RESULTS

Page 2 of 3

Client: CH2M Hill

Client Sample ID: PZAA-C3-041013-D

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1301523

CAS Sample ID: P1301523-013DUP

Test Code: EPA TO-15

Date Collected: 4/10/13

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: 4/11/13

Analyst: Simon Cao

Date Analyzed: 4/19/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:

Container ID: AC01336

Initial Pressure (psig): -3.18

Final Pressure (psig): 3.53

Canister Dilution Factor: 1.58

Compound	Sample Result		Duplicate Sample Result		Average µg/m³	% RPD	RPD Limit	Data Qualifier
	µg/m³	ppbV	µg/m³	ppbV				
cis-1,2-Dichloroethene	ND	ND	ND	ND	-	-	25	
Ethyl Acetate	1.88	0.522	1.94	0.540	1.91	3	25	
n-Hexane	0.790	0.224	0.812	0.230	0.801	3	25	
Chloroform	0.205	0.0421	0.223	0.0456	0.214	8	25	
Tetrahydrofuran (THF)	ND	ND	ND	ND	-	-	25	
1,2-Dichloroethane	ND	ND	ND	ND	-	-	25	
1,1,1-Trichloroethane	ND	ND	ND	ND	-	-	25	
Benzene	3.97	1.24	4.03	1.26	4	2	25	
Carbon Tetrachloride	0.438	0.0696	0.457	0.0726	0.4475	4	25	
Cyclohexane	ND	ND	ND	ND	-	-	25	
1,2-Dichloropropane	ND	ND	ND	ND	-	-	25	
Bromodichloromethane	ND	ND	ND	ND	-	-	25	
Trichloroethene	ND	ND	ND	ND	-	-	25	
1,4-Dioxane	ND	ND	ND	ND	-	-	25	
Methyl Methacrylate	ND	ND	ND	ND	-	-	25	
n-Heptane	ND	ND	ND	ND	-	-	25	
cis-1,3-Dichloropropene	ND	ND	ND	ND	-	-	25	
4-Methyl-2-pentanone	ND	ND	ND	ND	-	-	25	
trans-1,3-Dichloropropene	ND	ND	ND	ND	-	-	25	
1,1,2-Trichloroethane	ND	ND	ND	ND	-	-	25	
Toluene	4.15	1.10	4.24	1.12	4.195	2	25	
2-Hexanone	ND	ND	ND	ND	-	-	25	
Dibromochloromethane	ND	ND	ND	ND	-	-	25	
1,2-Dibromoethane	ND	ND	ND	ND	-	-	25	
n-Butyl Acetate	ND	ND	ND	ND	-	-	25	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

LABORATORY DUPLICATE SUMMARY RESULTS

Page 3 of 3

Client: CH2M Hill

Client Sample ID: PZAA-C3-041013-D

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1301523

CAS Sample ID: P1301523-013DUP

Test Code: EPA TO-15

Date Collected: 4/10/13

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Date Received: 4/11/13

Analyst: Simon Cao

Date Analyzed: 4/19/13

Sample Type: 6.0 L Summa Canister

Volume(s) Analyzed: 1.00 Liter(s)

Test Notes:

Container ID: AC01336

Initial Pressure (psig): -3.18

Final Pressure (psig): 3.53

Canister Dilution Factor: 1.58

Compound	Sample Result		Duplicate Sample Result		Average	% RPD	RPD Limit	Data Qualifier
	µg/m³	ppbV	µg/m³	ppbV	µg/m³			
n-Octane	ND	ND	ND	ND	-	-	25	
Tetrachloroethene	ND	ND	ND	ND	-	-	25	
Chlorobenzene	ND	ND	ND	ND	-	-	25	
Ethylbenzene	ND	ND	ND	ND	-	-	25	
m,p-Xylenes	1.44	0.332	1.46	0.336	1.45	1	25	
Bromoform	ND	ND	ND	ND	-	-	25	
Styrene	ND	ND	ND	ND	-	-	25	
o-Xylene	ND	ND	ND	ND	-	-	25	
n-Nonane	ND	ND	ND	ND	-	-	25	
1,1,2,2-Tetrachloroethane	ND	ND	ND	ND	-	-	25	
Cumene	ND	ND	ND	ND	-	-	25	
alpha-Pinene	ND	ND	ND	ND	-	-	25	
n-Propylbenzene	ND	ND	ND	ND	-	-	25	
4-Ethyltoluene	ND	ND	ND	ND	-	-	25	
1,3,5-Trimethylbenzene	ND	ND	ND	ND	-	-	25	
1,2,4-Trimethylbenzene	ND	ND	ND	ND	-	-	25	
Benzyl Chloride	ND	ND	ND	ND	-	-	25	
1,3-Dichlorobenzene	ND	ND	ND	ND	-	-	25	
1,4-Dichlorobenzene	ND	ND	ND	ND	-	-	25	
1,2-Dichlorobenzene	0.158	0.0263	0.164	0.0273	0.161	4	25	
d-Limonene	ND	ND	ND	ND	-	-	25	
1,2-Dibromo-3-chloropropane	ND	ND	ND	ND	-	-	25	
1,2,4-Trichlorobenzene	ND	ND	ND	ND	-	-	25	
Naphthalene	ND	ND	ND	ND	-	-	25	
Hexachlorobutadiene	ND	ND	ND	ND	-	-	25	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1301523

Method Blank Summary

Test Code: EPA TO-15
Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3 Lab File ID: 04161303.D
Analyst: Simon Cao Date Analyzed: 4/16/13
Sample Type: 6.0 L Summa Canister(s) Time Analyzed: 07:49
Test Notes:

Client Sample ID	CAS Sample ID	Lab File ID	Time Analyzed
Lab Control Sample	P130416-LCS	04161304.D	08:22
PZAA-P1-041013	P1301523-001	04161309.D	12:23
PZAA-P2-041013	P1301523-002	04161310.D	13:06
PZAA-P3-041013	P1301523-003	04161311.D	13:42
PZAA-P4-041013	P1301523-004	04161312.D	14:18
PZAA-P3-041013 (Dilution)	P1301523-003	04161313.D	14:51
PZAA-P5-041013	P1301523-005	04161314.D	16:24
PZAA-P6-041013	P1301523-006	04161315.D	17:03
PZAA-P7-041013	P1301523-007	04161316.D	17:41
PZAA-P8-041013	P1301523-008	04161317.D	18:28
PZAA-C1-041013	P1301523-009	04161318.D	19:04
PZAA-C2-041013	P1301523-010	04161319.D	19:41
PZAA-C3-041013	P1301523-011	04161320.D	20:39
PZAA-C4-041013	P1301523-012	04161321.D	21:15

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1301523

Method Blank Summary

Test Code: EPA TO-15
Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3 Lab File ID: 04191303.D
Analyst: Simon Cao Date Analyzed: 4/19/13
Sample Type: 6.0 L Summa Canister(s) Time Analyzed: 07:45
Test Notes:

Client Sample ID	CAS Sample ID	Lab File ID	Time Analyzed
Lab Control Sample	P130419-LCS	04191304.D	08:19
PZAA-C3-041013-D	P1301523-013	04191313.D	14:31
PZAA-C3-041013-D (Lab Duplicate)	P1301523-013DUP	04191314.D	15:11

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

CAS Project ID: P1301523

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

Internal Standard Area and RT Summary

Test Code: EPA TO-15

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Lab File ID: 04161301.D

Analyst: Simon Cao

Date Analyzed: 4/16/13

Sample Type: 6.0 L Summa Canister(s)

Time Analyzed: 06:40

Test Notes:

	IS1 (BCM)		IS2 (DFB)		IS3 (CBZ)	
	AREA #	RT #	AREA #	RT #	AREA #	RT #
24 Hour Standard	183685	11.06	815646	13.04	380533	16.65
Upper Limit	257159	11.39	1141904	13.37	532746	16.98
Lower Limit	110211	10.73	489388	12.71	228320	16.32

Client Sample ID

01	Method Blank	175464	11.06	790566	13.04	361468	16.65
02	Lab Control Sample	182208	11.07	805176	13.05	378652	16.65
03	PZAA-P1-041013	196173	11.06	863726	13.04	404448	16.65
04	PZAA-P2-041013	181566	11.06	808436	13.04	379869	16.65
05	PZAA-P3-041013	194817	11.07	848425	13.05	402286	16.65
06	PZAA-P4-041013	188530	11.07	851374	13.04	412433	16.65
07	PZAA-P3-041013 (Dilution)	188761	11.06	831035	13.04	393163	16.65
08	PZAA-P5-041013	197424	11.06	873142	13.04	419550	16.65
09	PZAA-P6-041013	182960	11.06	820942	13.04	399570	16.65
10	PZAA-P7-041013	186047	11.06	830588	13.04	402581	16.65
11	PZAA-P8-041013	185057	11.06	830962	13.05	399911	16.65
12	PZAA-C1-041013	186014	11.06	821008	13.04	388685	16.65
13	PZAA-C2-041013	182783	11.06	816955	13.04	384801	16.65
14	PZAA-C3-041013	179588	11.06	797162	13.04	379545	16.65
15	PZAA-C4-041013	175075	11.06	786923	13.04	369479	16.65
16							
17							
18							
19							
20							

IS1 (BCM) = Bromochloromethane

IS2 (DFB) = 1,4-Difluorobenzene

IS3 (CBZ) = Chlorobenzene-d5

AREA UPPER LIMIT = 140% of internal standard area

AREA LOWER LIMIT = 60% of internal standard area

RT UPPER LIMIT = 0.33 minutes of internal standard RT

RT LOWER LIMIT = 0.33 minutes of internal standard RT

Column used to flag values outside QC limits with an I.

I = Internal standard not within the specified limits.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

CAS Project ID: P1301523

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

Internal Standard Area and RT Summary

Test Code: EPA TO-15

Instrument ID: Tekmar AUTOCAN/HP5973/HP6890/MS3

Lab File ID: 04191301.D

Analyst: Simon Cao

Date Analyzed: 4/19/13

Sample Type: 6.0 L Summa Canister(s)

Time Analyzed: 06:38

Test Notes:

	IS1 (BCM)		IS2 (DFB)		IS3 (CBZ)	
	AREA #	RT #	AREA #	RT #	AREA #	RT #
24 Hour Standard	192834	11.07	853192	13.04	400275	16.65
Upper Limit	269968	11.40	1194469	13.37	560385	16.98
Lower Limit	115700	10.74	511915	12.71	240165	16.32

Client Sample ID

01	Method Blank	181562	11.07	828686	13.04	378478	16.65
02	Lab Control Sample	192987	11.07	854882	13.05	405795	16.65
03	PZAA-C3-041013-D	191972	11.06	864702	13.05	410898	16.65
04	PZAA-C3-041013-D (Lab Duplicate)	185696	11.06	837635	13.05	396520	16.65
05							
06							
07							
08							
09							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

IS1 (BCM) = Bromochloromethane

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AREA UPPER LIMIT = 140% of internal standard area

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RT LOWER LIMIT = 0.33 minutes of internal standard RT

Column used to flag values outside QC limits with an I.

I = Internal standard not within the specified limits.

Response Factor Report MSD3

Method Path : I:\MS03\METHODS\

Method File : R3040513.M

Title : EPA TO-15 Per SOP VOA-TO15 (CASS TO-15/GC-MS)

Last Update : Sat Apr 06 07:03:25 2013

Response Via : Initial Calibration

Calibration Files
 0.08=04051310.D 0.10=04051311.D 0.20=04051312.D 0.40=04051313.D 1.0 =04051314.D 5.0 =04051315.D
 25 =04051316.D 50 =04051317.D 100 =04051318.D

	Compound	0.08	0.10	0.20	0.40	1.0	5.0	100	Avg	%RSD
1)	IR Bromochloromethane									
2)	T Propene	1.470	1.451	1.114	1.489	1.178	1.860	1.652	1.433	1.475
3)	T Dichlorodifluo...	3.607	3.369	3.075	3.645	3.071	3.103	3.079	2.849	2.580
4)	T Chloromethane	1.843	2.192	2.063	2.347	2.009	1.875	1.988	1.697	1.249
5)	T 1,2-Dichloro-1...	2.018	1.955	1.746	2.078	1.689	1.743	1.609	1.506	1.506
6)	T Vinyl Chloride	1.882	2.168	1.670	2.251	1.899	2.031	2.060	1.874	1.705
7)	T 1,3-Butadiene	0.983	0.993	1.184	1.404	1.094	1.358	1.438	1.341	1.199
8)	T Bromomethane	1.263	1.373	1.263	1.399	1.134	1.187	1.286	1.224	1.129
9)	T Chloroethane	1.115	1.014	1.027	1.296	1.063	1.106	1.136	1.067	0.984
10)	T Ethanol	0.779	0.730	0.669	0.771	0.959	1.007	1.010	0.939	0.855
11)	T Acetonitrile	1.307	1.508	1.696	1.915	2.091	2.138	2.205	2.083	1.917
12)	T Acrolein									
13)	T Acetone	0.989	0.950	0.905	0.995	0.998	0.969	0.936	0.860	0.757
14)	T Trichlorofluor...	3.331	3.062	2.745	3.179	2.658	2.762	2.846	2.690	2.492
15)	T 2-Propanol (Is...)	3.133	3.084	3.090	3.353	3.520	2.370	2.872	2.370	2.108
16)	T Acrylonitrile									
17)	T 1,1-Dichloroet...	1.396	1.274	1.303	1.430	1.265	1.356	1.427	1.392	1.295
18)	T 2-Methyl-2-Pro...	3.514	3.295	3.165	3.751	3.466	3.728	3.868	2.088	3.359
19)	T Methylene Chlo...									
20)	T 3-Chloro-1-pro...	1.693	1.537	1.325	1.779	1.494	1.800	1.993	1.903	1.741
21)	T Trichlorotrifl...	1.495	1.520	1.352	1.516	1.308	1.332	1.404	1.360	1.264
22)	T Carbon Disulfide	4.951	4.787	4.241	5.236	4.593	4.995	5.099	4.835	4.437
23)	T trans-1,2-Dich...	1.872	1.856	1.700	2.059	1.807	1.959	2.053	1.935	1.773
24)	T 1,1-Dichloroet...	2.668	2.482	2.412	2.732	2.405	2.499	2.564	2.419	2.222
25)	T Methyl tert-Bu...	4.392	4.767	4.008	4.906	4.244	4.546	4.752	4.470	4.069
26)	T Vinyl Acetate									
27)	T 2-Butanone (MEK)									
28)	T cis-1,2-Dichlo...	1.815	1.882	1.702	2.075	1.790	1.878	1.956	1.842	1.687
29)	T Diisopropyl Ether	1.284	1.231	1.146	1.372	1.261	1.278	1.304	1.237	1.138
30)	T Ethyl Acetate	0.337	0.461	0.478	0.522	0.535	0.492	0.435	0.466	0.466

Revised Page 14.25

Response Factor Report MSD3

Method Path : I:\MS03\METHODS\

Method File : R3040513.M

Title : EPA TO-15 per SOP VOA-TO15 (CASS TO-15/GC-MS)

31) T	n-Hexane	2.931	2.849	2.439	2.851	2.466	2.522	2.492	2.254	1.930	2.526	12.64
32) T	Chloroform	2.845	2.672	2.280	2.702	2.350	2.431	2.515	2.392	2.221	2.490	8.45
33) S	1,2-Dichloroet...	1.279	1.291	1.330	1.347	1.392	1.350	1.314	1.274	1.240	1.313	3.57
34) T	Tetrahydrofura...	0.772	0.836	0.802	0.966	0.919	0.978	1.007	0.938	0.848	0.896	9.36
35) T	Ethyl tert-But...	1.846	1.803	1.770	1.974	1.750	1.867	1.968	1.883	1.761	1.847	4.57
36) T	1,2-Dichloroet...	1.805	1.904	1.739	1.953	1.806	1.839	1.901	1.789	1.646	1.820	5.13

37) IR	1,4-Difluorobenzene	...	...	...	...	...	...	...	...	...	...	ISTD
38) T	1,1,1-Trichlor...	0.545	0.526	0.462	0.547	0.471	0.519	0.557	0.541	0.502	0.519	6.56
39) T	Isopropyl Acetate	0.166	0.154	0.158	0.183	0.171	0.192	0.202	0.191	0.173	0.177	9.31
40) T	1-Butanol	0.163	0.251	0.317	0.342	0.328	0.300	0.283	0.300	0.283	0.283	23.56
41) T	Benzene	1.493	1.347	1.204	1.395	1.157	1.213	1.258	1.197	1.089	1.261	10.09
42) T	Carbon Tetrach...	0.340	0.333	0.299	0.387	0.329	0.392	0.441	0.434	0.407	0.374	13.45
43) T	Cyclohexane	0.618	0.582	0.522	0.621	0.516	0.540	0.560	0.531	0.480	0.552	8.61
44) T	tert-Amyl Meth...	0.982	0.956	0.840	0.973	0.846	0.955	1.016	0.973	0.894	0.937	6.66
45) T	1,2-Dichloropr...	0.309	0.320	0.287	0.335	0.291	0.311	0.329	0.313	0.288	0.309	5.68
46) T	Bromodichlorom...	0.326	0.344	0.318	0.363	0.348	0.408	0.451	0.436	0.408	0.378	12.93
47) T	Trichloroethene	0.455	0.425	0.385	0.421	0.376	0.392	0.420	0.406	0.382	0.407	6.34
48) T	1,4-Dioxane	0.218	0.203	0.180	0.234	0.233	0.266	0.285	0.276	0.254	0.239	14.55
49) T	2,2,4-Trimethyl...	1.558	1.523	1.381	1.634	1.351	1.428	1.454	1.355	1.191	1.431	9.22
50) T	Methyl Methacry...	0.085	0.117	0.122	0.146	0.162	0.158	0.158	0.148	0.134	0.134	20.61
51) T	n-Heptane	0.339	0.348	0.335	0.378	0.330	0.357	0.374	0.356	0.326	0.349	5.30
52) T	cis-1,3-Dichlo...	0.419	0.393	0.489	0.545	0.522	0.483	0.475	0.475	0.475	0.475	12.32
53) T	4-Methyl-2-pen...	0.240	0.252	0.295	0.315	0.298	0.267	0.267	0.267	0.267	0.267	10.47
54) T	trans-1,3-Dich...	0.305	0.316	0.422	0.496	0.486	0.454	0.454	0.454	0.454	0.454	20.28
55) T	1,1,2-Trichlor...	0.319	0.306	0.277	0.323	0.300	0.328	0.350	0.339	0.315	0.317	6.85
56) IR	Chlorobenzene-d5	...	...	...	...	...	...	...	...	...	...	ISTD
57) S	Toluene-d8 (SS2)	2.345	2.337	2.318	2.313	2.322	2.280	2.286	2.302	2.262	2.307	1.19
58) T	Toluene	3.650	3.400	2.955	3.454	2.930	3.051	3.191	3.060	2.682	3.153	9.58
59) T	2-Hexanone	0.445	0.468	0.435	0.871	1.070	1.264	1.353	1.288	1.136	1.164	15.21
60) T	Dibromochlorom...	0.566	0.558	0.514	0.648	0.617	0.716	0.792	0.782	0.727	0.658	24.99
61) T	1,2-Dibromoethane	0.631	0.595	0.569	0.635	0.579	0.623	0.640	0.606	0.537	0.602	5.81
62) T	n-Butyl Acetate	1.131	1.048	0.929	1.075	0.925	0.965	1.033	1.028	0.963	1.011	6.93
63) T	Tetrachloroethene	2.245	2.144	1.836	2.081	1.855	1.942	2.049	2.001	1.794	1.994	7.59
64) T	Chlorobenzene	3.559	3.412	2.978	3.609	3.267	3.481	3.680	3.512	3.004	3.389	7.51
65) T	Ethylbenzene	2.833	2.688	2.410	2.808	2.563	2.749	2.900	2.755	2.343	2.672	7.22
66) T	m- & p-Xylenes	0.363	0.406	0.577	0.732	0.751	0.719	0.591	0.591	0.591	0.591	29.12
67) T	Bromoform	0.363	0.406	0.577	0.732	0.751	0.719	0.591	0.591	0.591	0.591	29.12

Response Factor Report MSD3

Method	Path : I:\MMS03\METHODS\	Method	File : R3040513.M	Title	EPA TO-15 per SOP VOA-TO15 (CASS TO-15/GC-MS)
69) T	Styrene	70) T	o-Xylene	71) T	n-Nonane
72) T	1,1,2,2-Tetrac...	73) S	Bromofluoroben...	74) T	Cumene
75) T	alpha-Pinene	76) T	n-Propylbenzene	77) T	3-Ethyltoluene
78) T	4-Ethyltoluene	79) T	1,3,5-Trimethyl...	80) T	alpha-Methylsty...
81) T	2-Ethyltoluene	82) T	1,2,4-Trimethyl...	83) T	n-Decane
84) T	Benzyl Chloride	85) T	1,3-Dichlorobe...	86) T	1,4-Dichlorobe...
87) T	sec-Butylbenzene	88) T	4-Isopropyltol...	89) T	1,2,3-Trimethyl...
90) T	1,2-Dichlorobe...	91) T	d-Limonene	92) T	1,2-Dibromo-3-...
93) T	n-Undecane	94) T	1,2,4-Trichlor...	95) T	Naphthalene
96) T	n-Dodecane	97) T	Hexachlorobuta...	98) T	Cyclohexanone
99) T	tert-Butylbenzene	100) T	n-Butylbenzene		

(##) = Out of Range

Evaluate Continuing Calibration Report

Data Path : J:\MS03\DATA\2013_04\16\
 Data File : 04161301.D
 Acq On : 16 Apr 2013 6:40
 Operator : SC
 Sample : 25ng TO-15 CCV STD
 Misc : (S25-04051301) (S25-03281312) (4/26)
 ALS Vial : 3 Sample Multiplier: 1

Quant Time: Apr 16 09:05:43 2013
 Quant Method : I:\MS03\METHODS\R3040513.M
 Quant Title : EPA TO-15 per SOP VOA-TO15 (CASS TO-15/GC-MS)
 QLast Update : Sat Apr 06 07:03:25 2013
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 200%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1 IR	Bromochloromethane (IS1)	1.000	1.000	0.0	113	-0.02
2 T	Propene	1.475	1.350	8.5	93	0.00
3 T	Dichlorodifluoromethane (CF	3.153	2.654	15.8	98	0.00
4 T	Chloromethane	1.918	1.596	16.8	91	0.00
5 T	1,2-Dichloro-1,1,2,2-tetraf	1.782	1.636	8.2	106	0.00
6 T	Vinyl Chloride	1.949	1.712	12.2	94	0.00
7 T	1,3-Butadiene	1.222	1.166	4.6	92	-0.02
8 T	Bromomethane	1.251	1.164	7.0	102	-0.02
9 T	Chloroethane	1.090	0.960	11.9	96	0.00
10 T	Ethanol	0.858	0.811	5.5	91	-0.08
11 T	Acetonitrile	1.873	1.767	5.7	91	-0.05
12 T	Acrolein	0.693	0.641	7.5	92	-0.02
13 T	Acetone	0.929	0.774	16.7	94	-0.04
14 T	Trichlorofluoromethane	2.863	2.513	12.2	100	-0.02
15 T	2-Propanol (Isopropanol)	2.878	2.141	25.6	84	-0.06
16 T	Acrylonitrile	1.466	1.357	7.4	94	-0.04
17 T	1,1-Dichloroethene	1.346	1.290	4.2	102	-0.02
18 T	2-Methyl-2-Propanol (tert-B	3.359	3.086	8.1	90	-0.03
19 T	Methylene Chloride	1.549	1.305	15.8	101	-0.02
20 T	3-Chloro-1-propene (Allyl C	1.696	1.595	6.0	91	-0.02
21 T	Trichlorotrifluoroethane	1.395	1.337	4.2	108	-0.02
22 T	Carbon Disulfide	4.797	4.464	6.9	99	-0.02
23 T	trans-1,2-Dichloroethene	1.890	1.730	8.5	95	0.00
24 T	1,1-Dichloroethane	2.489	2.174	12.7	96	-0.02
25 T	Methyl tert-Butyl Ether	4.462	4.115	7.8	98	0.00
26 T	Vinyl Acetate	0.334	0.358	-7.2	101	-0.04
27 T	2-Butanone (MEK)	0.878	0.859	2.2	98	-0.03
28 T	cis-1,2-Dichloroethene	1.848	1.645	11.0	95	-0.02
29 T	Diisopropyl Ether	1.250	1.166	6.7	101	0.00
30 T	Ethyl Acetate	0.466	0.443	4.9	94	-0.03
31 T	n-Hexane	2.526	2.070	18.1	94	0.00
32 T	Chloroform	2.490	2.208	11.3	99	-0.02
33 S	1,2-Dichloroethane-d4 (SS1)	1.313	1.217	7.3	105	-0.02
34 T	Tetrahydrofuran (THF)	0.896	0.850	5.1	96	-0.02
35 T	Ethyl tert-Butyl Ether	1.847	1.749	5.3	101	-0.02
36 T	1,2-Dichloroethane	1.820	1.614	11.3	96	-0.02
37 IR	1,4-Difluorobenzene (IS2)	1.000	1.000	0.0	113	-0.02

R3040513.M Tue Apr 16 09:06:54 2013

4/16/13

Page: 1

Revised Page

Evaluate Continuing Calibration Report

Data Path : J:\MS03\DATA\2013_04\16\
 Data File : 04161301.D
 Acq On : 16 Apr 2013 6:40
 Operator : SC
 Sample : 25ng TO-15 CCV STD
 Misc : (S25-04051301) (S25-03281312) (4/26)
 ALS Vial : 3 Sample Multiplier: 1

Quant Time: Apr 16 09:05:43 2013
 Quant Method : I:\MS03\METHODS\R3040513.M
 Quant Title : EPA TO-15 per SOP VOA-TO15 (CASS TO-15/GC-MS)
 QLast Update : Sat Apr 06 07:03:25 2013
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 200%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
38 T	1,1,1-Trichloroethane	0.519	0.498	4.0	101	0.00
39 T	Isopropyl Acetate	0.177	0.171	3.4	95	-0.02
40 T	1-Butanol	0.283	0.282	0.4	93	-0.04
41 T	Benzene	1.261	1.116	11.5	100	0.00
42 T	Carbon Tetrachloride	0.374	0.399	-6.7	102	-0.02
43 T	Cyclohexane	0.552	0.496	10.1	100	-0.02
44 T	tert-Amyl Methyl Ether	0.937	0.886	5.4	98	-0.02
45 T	1,2-Dichloropropane	0.309	0.279	9.7	96	-0.02
46 T	Bromodichloromethane	0.378	0.396	-4.8	99	-0.02
47 T	Trichloroethene	0.407	0.392	3.7	105	-0.02
48 T	1,4-Dioxane	0.239	0.256	-7.1	101	-0.02
49 T	2,2,4-Trimethylpentane (Iso)	1.431	1.226	14.3	95	-0.02
50 T	Methyl Methacrylate	0.134	0.150	-11.9	104	-0.02
51 T	n-Heptane	0.349	0.326	6.6	98	0.00
52 T	cis-1,3-Dichloropropene	0.475	0.475	0.0	98	0.00
53 T	4-Methyl-2-pentanone	0.278	0.264	5.0	94	-0.01
54 T	trans-1,3-Dichloropropene	0.413	0.434	-5.1	99	-0.01
55 T	1,1,2-Trichloroethane	0.317	0.318	-0.3	102	-0.02
56 IR	Chlorobenzene-d5 (IS3)	1.000	1.000	0.0	109	0.00
57 S	Toluene-d8 (SS2)	2.307	2.318	-0.5	111	0.00
58 T	Toluene	3.153	2.988	5.2	102	-0.02
59 T	2-Hexanone	1.164	1.128	3.1	91	-0.01
60 T	Dibromochloromethane	0.613	0.777	-26.8	105	0.00
61 T	1,2-Dibromoethane	0.658	0.755	-14.7	104	0.00
62 T	n-Butyl Acetate	1.408	1.367	2.9	90	0.00
63 T	n-Octane	0.602	0.553	8.1	94	0.00
64 T	Tetrachloroethene	1.011	1.032	-2.1	109	0.00
65 T	Chlorobenzene	1.994	1.957	1.9	104	0.00
66 T	Ethylbenzene	3.389	3.417	-0.8	101	0.00
67 T	m- & p-Xylenes	2.672	2.695	-0.9	101	-0.02
68 T	Bromoform	0.591	0.726	-22.8	108	-0.01
69 T	Styrene	1.860	2.014	-8.3	103	0.00
70 T	o-Xylene	2.838	2.842	-0.1	101	-0.02
71 T	n-Nonane	1.290	1.168	9.5	91	0.00
72 T	1,1,2,2-Tetrachloroethane	1.116	1.216	-9.0	99	-0.02
73 S	Bromofluorobenzene (SS3)	0.964	1.059	-9.9	120	0.00
74 T	Cumene	3.810	3.828	-0.5	103	0.00

Evaluate Continuing Calibration Report

Data Path : J:\MS03\DATA\2013_04\16\
 Data File : 04161301.D
 Acq On : 16 Apr 2013 6:40
 Operator : SC
 Sample : 25ng TO-15 CCV STD
 Misc : (S25-04051301) (S25-03281312) (4/26)
 ALS Vial : 3 Sample Multiplier: 1

Quant Time: Apr 16 09:05:43 2013
 Quant Method : I:\MS03\METHODS\R3040513.M
 Quant Title : EPA TO-15 per SOP VOA-TO15 (CASS TO-15/GC-MS)
 QLast Update : Sat Apr 06 07:03:25 2013
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 200%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
75 T	alpha-Pinene	1.766	1.791	-1.4	101	0.00
76 T	n-Propylbenzene	4.125	4.315	-4.6	101	0.00
77 T	3-Ethyltoluene	3.385	3.868	-14.3	110	0.00
78 T	4-Ethyltoluene	3.296	3.374	-2.4	97	0.00
79 T	1,3,5-Trimethylbenzene	2.826	2.977	-5.3	104	0.00
80 T	alpha-Methylstyrene	1.338	1.483	-10.8	102	0.00
81 T	2-Ethyltoluene	3.598	3.746	-4.1	103	-0.02
82 T	1,2,4-Trimethylbenzene	2.786	3.030	-8.8	102	-0.02
83 T	n-Decane	1.446	1.404	2.9	96	0.00
84 T	Benzyl Chloride	1.970	2.424	-23.0	100	0.00
85 T	1,3-Dichlorobenzene	1.594	1.792	-12.4	107	-0.02
86 T	1,4-Dichlorobenzene	1.630	1.808	-10.9	106	0.00
87 T	sec-Butylbenzene	3.862	4.027	-4.3	102	0.00
88 T	4-Isopropyltoluene (p-Cymen	3.674	4.125	-12.3	104	0.00
89 T	1,2,3-Trimethylbenzene	2.908	3.138	-7.9	103	0.00
90 T	1,2-Dichlorobenzene	1.565	1.781	-13.8	108	0.00
91 T	d-Limonene	0.915	1.043	-14.0	95	0.00
92 T	1,2-Dibromo-3-Chloropropane	0.531	0.659	-24.1	109	0.00
93 T	n-Undecane	1.330	1.345	-1.1	94	0.00
94 T	1,2,4-Trichlorobenzene	1.239	1.366	-10.3	107	0.00
95 T	Naphthalene	3.871	4.455	-15.1	105	0.00
96 T	n-Dodecane	0.959	0.945	1.5	85	0.00
97 T	Hexachlorobutadiene	0.740	0.879	-18.8	110	0.00
98 T	Cyclohexanone	0.892	0.899	-0.8	94	-0.02
99 T	tert-Butylbenzene	3.054	3.121	-2.2	103	0.00
100 T	n-Butylbenzene	2.573	2.878	-11.9	101	0.00

(#) = Out of Range

SPCC's out = 0 CCC's out = 0

Evaluate Continuing Calibration Report

Data Path : J:\MS03\DATA\2013_04\19\
 Data File : 04191301.D
 Acq On : 19 Apr 2013 6:38
 Operator : SC
 Sample : 25ng TO-15 CCV STD
 Misc : (S25-04051301) (S25-03281312) (4/26)
 ALS Vial : 3 Sample Multiplier: 1

Quant Time: Apr 19 09:31:22 2013
 Quant Method : I:\MS03\METHODS\R3040513.M
 Quant Title : EPA TO-15 per SOP VOA-TO15 (CASS TO-15/GC-MS)
 QLast Update : Sat Apr 06 07:03:25 2013
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 200%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev (min)
1	IR Bromochloromethane (IS1)	1.000	1.000	0.0	119	-0.01
2	T Propene	1.475	1.121	24.0	81	0.00
3	T Dichlorodifluoromethane (CF	3.153	2.506	20.5	97	0.00
4	T Chloromethane	1.918	1.525	20.5	91	0.00
5	T 1,2-Dichloro-1,1,2,2-tetrafluoroethane	1.782	1.569	12.0	107	0.00
6	T Vinyl Chloride	1.949	1.635	16.1	94	0.00
7	T 1,3-Butadiene	1.222	1.144	6.4	95	-0.01
8	T Bromomethane	1.251	1.112	11.1	103	-0.01
9	T Chloroethane	1.090	0.923	15.3	97	0.00
10	T Ethanol	0.858	0.773	9.9	91	-0.08
11	T Acetonitrile	1.873	1.664	11.2	90	-0.05
12	T Acrolein	0.693	0.614	11.4	93	-0.01
13	T Acetone	0.929	0.750	19.3	95	-0.04
14	T Trichlorofluoromethane	2.863	2.386	16.7	100	-0.01
15	T 2-Propanol (Isopropanol)	2.878	2.420	15.9	100	-0.05
16	T Acrylonitrile	1.466	1.286	12.3	93	-0.03
17	T 1,1-Dichloroethene	1.346	1.237	8.1	103	-0.01
18	T 2-Methyl-2-Propanol (tert-Butyl Alcohol)	3.359	2.957	12.0	91	-0.03
19	T Methylene Chloride	1.549	1.238	20.1	100	-0.01
20	T 3-Chloro-1-propene (Allyl Chloride)	1.696	1.532	9.7	91	-0.01
21	T Trichlorotrifluoroethane	1.395	1.278	8.4	108	-0.01
22	T Carbon Disulfide	4.797	4.217	12.1	98	-0.01
23	T trans-1,2-Dichloroethene	1.890	1.645	13.0	95	0.00
24	T 1,1-Dichloroethane	2.489	2.096	15.8	97	-0.01
25	T Methyl tert-Butyl Ether	4.462	3.948	11.5	99	0.00
26	T Vinyl Acetate	0.334	0.343	-2.7	101	-0.04
27	T 2-Butanone (MEK)	0.878	0.819	6.7	98	-0.03
28	T cis-1,2-Dichloroethene	1.848	1.565	15.3	95	-0.01
29	T Diisopropyl Ether	1.250	1.105	11.6	101	0.00
30	T Ethyl Acetate	0.466	0.426	8.6	95	-0.03
31	T n-Hexane	2.526	1.959	22.4	93	0.00
32	T Chloroform	2.490	2.114	15.1	100	-0.02
33	S 1,2-Dichloroethane-d4 (SS1)	1.313	1.197	8.8	108	-0.01
34	T Tetrahydrofuran (THF)	0.896	0.829	7.5	98	-0.01
35	T Ethyl tert-Butyl Ether	1.847	1.681	9.0	102	-0.01
36	T 1,2-Dichloroethane	1.820	1.536	15.6	96	-0.02
37	IR 1,4-Difluorobenzene (IS2)	1.000	1.000	0.0	118	-0.01

Evaluate Continuing Calibration Report

Data Path : J:\MS03\DATA\2013_04\19\
 Data File : 04191301.D
 Acq On : 19 Apr 2013 6:38
 Operator : SC
 Sample : 25ng TO-15 CCV STD
 Misc : (S25-04051301) (S25-03281312) (4/26)
 ALS Vial : 3 Sample Multiplier: 1

Quant Time: Apr 19 09:31:22 2013
 Quant Method : I:\MS03\METHODS\R3040513.M
 Quant Title : EPA TO-15 per SOP VOA-TO15 (CASS TO-15/GC-MS)
 QLast Update : Sat Apr 06 07:03:25 2013
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 200%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
38 T	1,1,1-Trichloroethane	0.519	0.475	8.5	100	0.00
39 T	Isopropyl Acetate	0.177	0.165	6.8	96	-0.02
40 T	1-Butanol	0.283	0.270	4.6	93	-0.05
41 T	Benzene	1.261	1.070	15.1	100	0.00
42 T	Carbon Tetrachloride	0.374	0.375	-0.3	100	-0.01
43 T	Cyclohexane	0.552	0.474	14.1	100	-0.02
44 T	tert-Amyl Methyl Ether	0.937	0.852	9.1	99	-0.01
45 T	1,2-Dichloropropane	0.309	0.268	13.3	96	-0.01
46 T	Bromodichloromethane	0.378	0.381	-0.8	100	-0.01
47 T	Trichloroethene	0.407	0.378	7.1	106	-0.01
48 T	1,4-Dioxane	0.239	0.246	-2.9	102	-0.02
49 T	2,2,4-Trimethylpentane (Iso)	1.431	1.162	18.8	94	-0.01
50 T	Methyl Methacrylate	0.134	0.145	-8.2	106	-0.02
51 T	n-Heptane	0.349	0.311	10.9	98	0.00
52 T	cis-1,3-Dichloropropene	0.475	0.458	3.6	99	0.00
53 T	4-Methyl-2-pentanone	0.278	0.252	9.4	94	-0.02
54 T	trans-1,3-Dichloropropene	0.413	0.419	-1.5	99	-0.01
55 T	1,1,2-Trichloroethane	0.317	0.306	3.5	103	-0.01
56 IR	Chlorobenzene-d5 (IS3)	1.000	1.000	0.0	115	0.00
57 S	Toluene-d8 (SS2)	2.307	2.302	0.2	115	0.00
58 T	Toluene	3.153	2.855	9.5	103	-0.01
59 T	2-Hexanone	1.164	1.071	8.0	91	-0.01
60 T	Dibromochloromethane	0.613	0.741	-20.9	106	0.00
61 T	1,2-Dibromoethane	0.658	0.722	-9.7	104	-0.01
62 T	n-Butyl Acetate	1.408	1.301	7.6	90	0.00
63 T	n-Octane	0.602	0.530	12.0	95	0.00
64 T	Tetrachloroethene	1.011	1.002	0.9	111	0.00
65 T	Chlorobenzene	1.994	1.873	6.1	105	0.00
66 T	Ethylbenzene	3.389	3.276	3.3	102	0.00
67 T	m- & p-Xylenes	2.672	2.585	3.3	102	-0.01
68 T	Bromoform	0.591	0.704	-19.1	110	-0.01
69 T	Styrene	1.860	1.930	-3.8	104	0.00
70 T	o-Xylene	2.838	2.722	4.1	102	-0.01
71 T	n-Nonane	1.290	1.109	14.0	91	0.00
72 T	1,1,2,2-Tetrachloroethane	1.116	1.166	-4.5	100	-0.01
73 S	Bromofluorobenzene (SS3)	0.964	1.074	-11.4	128	0.00
74 T	Cumene	3.810	3.649	4.2	104	0.00

Evaluate Continuing Calibration Report

Data Path : J:\MS03\DATA\2013_04\19\
 Data File : 04191301.D
 Acq On : 19 Apr 2013 6:38
 Operator : SC
 Sample : 25ng TO-15 CCV STD
 Misc : (S25-04051301) (S25-03281312) (4/26)
 ALS Vial : 3 Sample Multiplier: 1

Quant Time: Apr 19 09:31:22 2013
 Quant Method : I:\MS03\METHODS\R3040513.M
 Quant Title : EPA TO-15 per SOP VOA-TO15 (CASS TO-15/GC-MS)
 QLast Update : Sat Apr 06 07:03:25 2013
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 200%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
75 T	alpha-Pinene	1.766	1.707	3.3	101	0.00
76 T	n-Propylbenzene	4.125	4.117	0.2	102	0.00
77 T	3-Ethyltoluene	3.385	3.464	-2.3	103	-0.01
78 T	4-Ethyltoluene	3.296	3.450	-4.7	104	-0.01
79 T	1,3,5-Trimethylbenzene	2.826	2.853	-1.0	105	0.00
80 T	alpha-Methylstyrene	1.338	1.410	-5.4	102	0.00
81 T	2-Ethyltoluene	3.598	3.583	0.4	104	-0.01
82 T	1,2,4-Trimethylbenzene	2.786	2.900	-4.1	103	-0.01
83 T	n-Decane	1.446	1.320	8.7	95	-0.01
84 T	Benzyl Chloride	1.970	2.331	-18.3	101	0.00
85 T	1,3-Dichlorobenzene	1.594	1.731	-8.6	109	-0.01
86 T	1,4-Dichlorobenzene	1.630	1.752	-7.5	108	0.00
87 T	sec-Butylbenzene	3.862	3.848	0.4	103	-0.01
88 T	4-Isopropyltoluene (p-Cymen	3.674	3.956	-7.7	105	-0.01
89 T	1,2,3-Trimethylbenzene	2.908	3.009	-3.5	104	0.00
90 T	1,2-Dichlorobenzene	1.565	1.706	-9.0	108	0.00
91 T	d-Limonene	0.915	0.993	-8.5	95	0.00
92 T	1,2-Dibromo-3-Chloropropane	0.531	0.633	-19.2	111	0.00
93 T	n-Undecane	1.330	1.294	2.7	96	0.00
94 T	1,2,4-Trichlorobenzene	1.239	1.322	-6.7	108	0.00
95 T	Naphthalene	3.871	4.312	-11.4	107	0.00
96 T	n-Dodecane	0.959	1.064	-10.9	101	0.00
97 T	Hexachlorobutadiene	0.740	0.845	-14.2	111	0.00
98 T	Cyclohexanone	0.892	0.854	4.3	94	-0.01
99 T	tert-Butylbenzene	3.054	2.973	2.7	103	0.00
100 T	n-Butylbenzene	2.573	2.764	-7.4	102	0.00

(#) = Out of Range

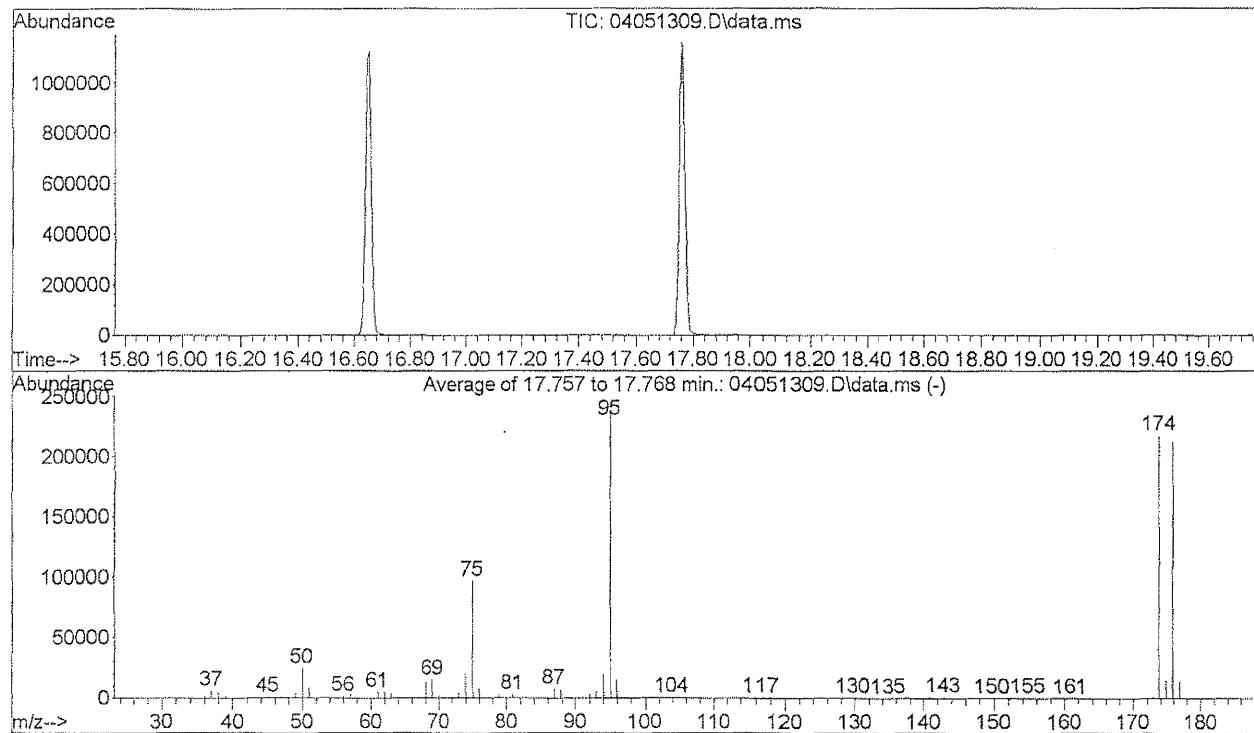
SPCC's out = 0 CCC's out = 0

BFB

Data Path : J:\MS03\DATA\2013_04\05\
 Data File : 04051309.D
 Acq On : 5 Apr 2013 17:34
 Operator : SC
 Sample : 12.5ng TO-15 BFB STD
 Misc : (S25-04051301)
 ALS Vial : 3 Sample Multiplier: 1

Integration File: RTEINT.P

Method : J:\MS03\METHODS\R3040513.M
 Title : EPA TO-15 per SOP VOA-TO15 (CASS TO-15/GC-MS)
 Last Update : Sat Apr 06 07:03:25 2013



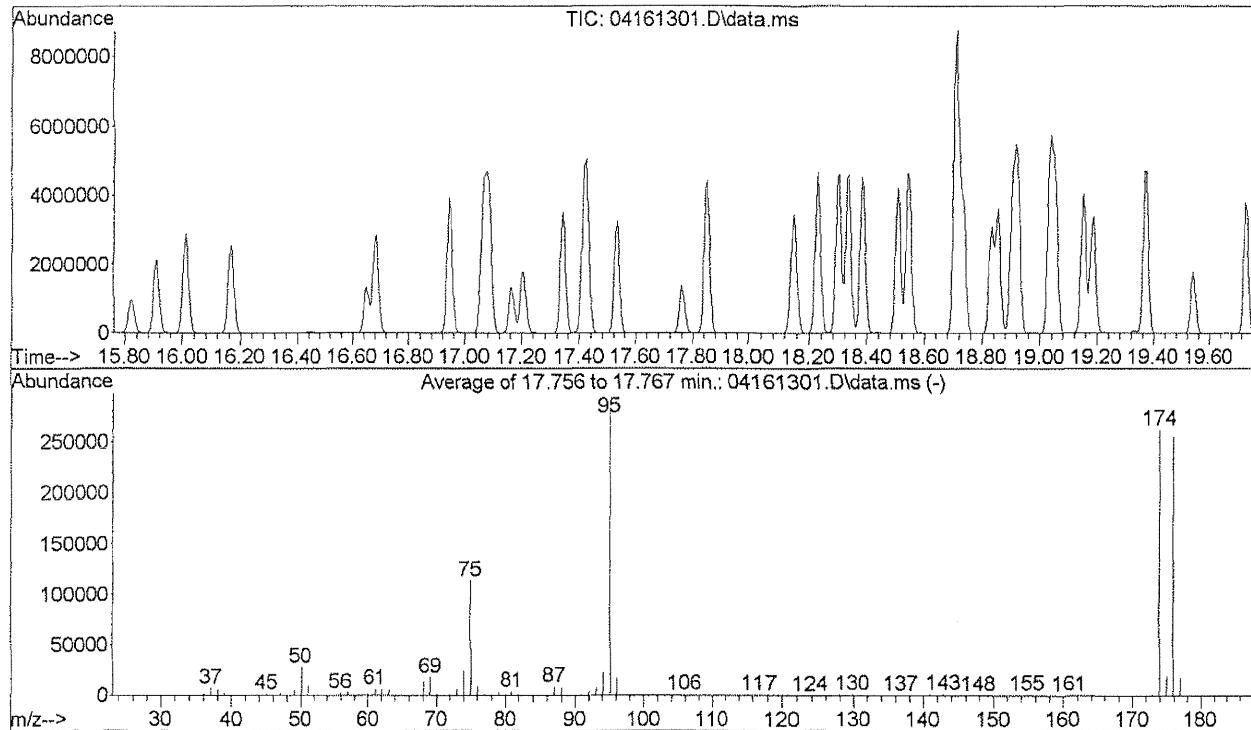
AutoFind: Scans 2538, 2539, 2540; Background Corrected with Scan 2531

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	8	40	10.4	24853	PASS
75	95	30	66	40.6	96859	PASS
95	95	100	100	100.0	238741	PASS
96	95	5	9	6.6	15772	PASS
173	174	0.00	2	0.5	1162	PASS
174	95	50	120	91.5	218411	PASS
175	174	4	9	7.0	15234	PASS
176	174	93	101	97.4	212757	PASS
177	176	5	9	6.5	13739	PASS

Data Path : J:\MS03\DATA\2013_04\16\
 Data File : 04161301.D
 Acq On : 16 Apr 2013 6:40
 Operator : SC
 Sample : 25ng TO-15 CCV STD
 Misc : (S25-04051301) (S25-03281312) (4/26)
 ALS Vial : 3 Sample Multiplier: 1

Integration File: RTEINT.P

Method : I:\MS03\METHODS\R3040513.M
 Title : EPA TO-15 per SOP VOA-TO15 (CASS TO-15/GC-MS)
 Last Update : Sat Apr 06 07:03:25 2013



AutoFind: Scans 2538, 2539, 2540; Background Corrected with Scan 2531

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	8	40	9.8	27808	PASS
75	95	30	66	40.1	113419	PASS
95	95	100	100	100.0	282923	PASS
96	95	5	9	6.1	17309	PASS
173	174	0.00	2	0.5	1275	PASS
174	95	50	120	92.4	261504	PASS
175	174	4	9	7.0	18384	PASS
176	174	93	101	97.4	254805	PASS
177	176	5	9	6.5	16580	PASS

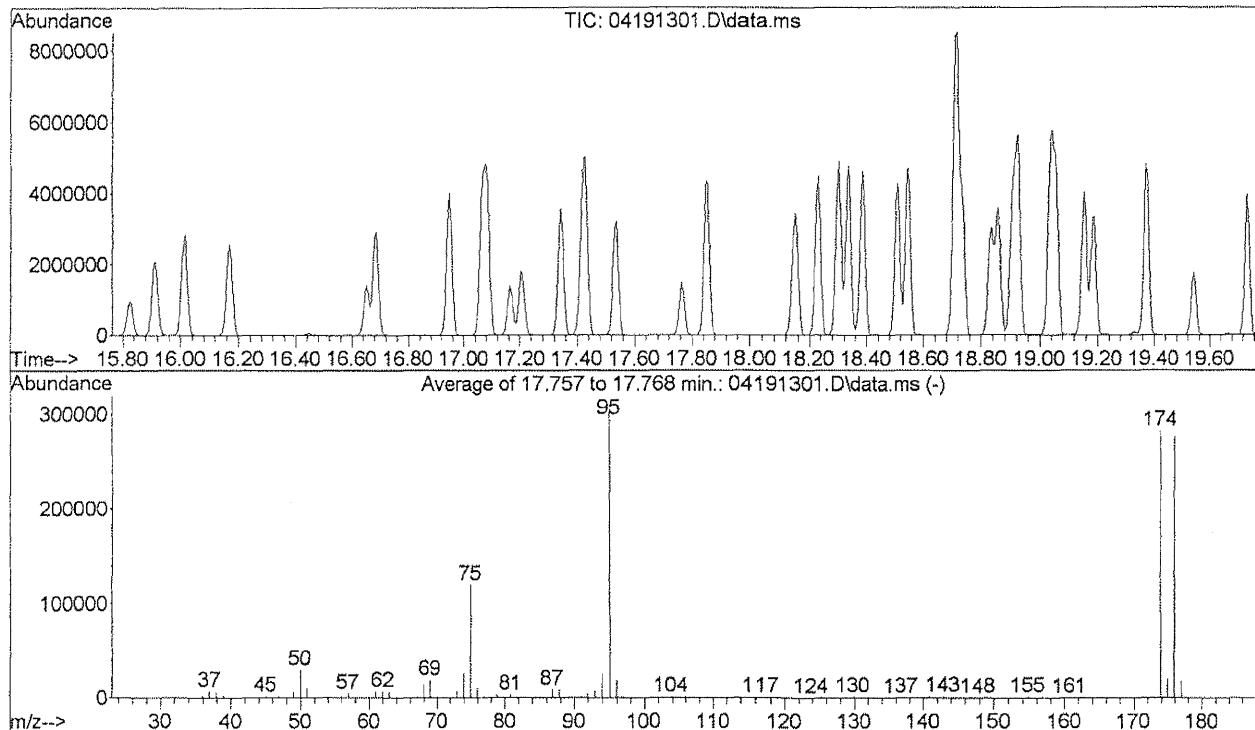
C-4/16/13

BFB

Data Path : J:\MS03\DATA\2013_04\19\
Data File : 04191301.D
Acq On : 19 Apr 2013 6:38
Operator : SC
Sample : 25ng TO-15 CCV STD
Misc : (S25-04051301) (S25-03281312) (4/26)
ALS Vial : 3 Sample Multiplier: 1

Integration File: RTEINT.P

Method : I:\MS03\METHODS\R3040513.M
Title : EPA TO-15 per SOP VOA-TO15 (CASS TO-15/GC-MS)
Last Update : Sat Apr 06 07:03:25 2013



AutoFind: Scans 2538, 2539, 2540; Background Corrected with Scan 2531

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	8	40	9.8	29787	PASS
75	95	30	66	39.2	119363	PASS
95	95	100	100	100.0	304299	PASS
96	95	5	9	6.2	18758	PASS
173	174	0.00	2	0.1	414	PASS
174	95	50	120	92.8	282283	PASS
175	174	4	9	7.0	19760	PASS
176	174	93	101	97.8	276160	PASS
177	176	5	9	6.6	18357	PASS

C-4(19)D

QC Certification



ALS Environmental
 2655 Park Center Drive, Suite A
 Simi Valley, CA 93065
 Ph. 805-526-7161
 Fax 805-526-7270

<u>Container IDs</u>	<u>Cleaned Date</u>	<u>Date Analyzed</u>	<u>QC Results</u>	<u>Comments</u>
AC00813	3/28/13	4/2/13	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC00981	3/28/13	4/2/13	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01183	3/28/13	4/2/13	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01280	3/28/13	4/2/13	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01336	3/28/13	4/2/13	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01434	3/28/13	4/2/13	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01572	3/28/13	4/2/13	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01588	3/28/13	4/2/13	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01644	3/28/13	3/29/13	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01894	3/28/13	4/2/13	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01919	3/28/13	4/2/13	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01953	3/28/13	4/2/13	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AC01955	3/28/13	4/2/13	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AS00123	3/28/13	4/2/13	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AS00391	3/28/13	4/2/13	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
AS00403	3/28/13	4/2/13	Pass w/ Conditions	EPA TO-15 (75 Cmpds. LL + TICs)
FCA00031	3/27/13	3/28/13		
FCA00051	4/1/13	4/2/13		
FCA00065	4/1/13	4/2/13		
FCA00077	3/26/13	3/27/13		
FCA00111	3/26/13	3/27/13		
FCA00259	4/1/13	4/2/13		
FCA00261	3/28/13	3/29/13		
FCA00262	4/1/13	4/2/13		
FCA00391	4/1/13	4/2/13		
FCA00463	4/1/13	4/2/13		
FCA00470	3/27/13	3/28/13		
FCA00519	4/1/13	4/2/13		

* QC Canister

LABORATORY REPORT

July 31, 2013

Karen Mordock
CH2M Hill
1717 Arch Street, Suite 4400
Philadelphia, PA 19103

RE: Pfizer Ambient Air Monitoring / 431248.AM.FW

Dear Karen:

Your report number P1301529 has been amended for the samples submitted to our laboratory on April 12, 2013. The Privileged and Confidential water mark has been removed from all of the report pages. The revised pages have been indicated by the "Revised Page" footer located at the bottom right of the page.

All analyses were performed according to our laboratory's NELAP and DoD-ELAP-approved quality assurance program. The test results meet requirements of the current NELAP and DoD-ELAP standards, where applicable, and except as noted in the laboratory case narrative provided. For a specific list of NELAP and DoD-ELAP-accredited analytes, refer to the certifications section at www.caslab.com. Results are intended to be considered in their entirety and apply only to the samples analyzed and reported herein.

If you have any questions, please call me at (805) 526-7161.

Respectfully submitted,

ALS | Environmental

Kelly Horiuchi

By Kelly Horiuchi at 8:16 pm, Jul 31, 2013

Kelly Horiuchi
Laboratory Director

Client: CH2M Hill
Project: Pfizer Ambient Air Monitoring / 431248.AM.FW

Service Request No: P1301529

CASE NARRATIVE

The samples were received intact under chain of custody on April 12, 2013 and were stored in accordance with the analytical method requirements. Please refer to the sample acceptance check form for additional information. The results reported herein are applicable only to the condition of the samples at the time of sample receipt.

Sulfur Analysis

The samples were analyzed for twenty sulfur compounds per ASTM D 5504-08 using a gas chromatograph equipped with a sulfur chemiluminescence detector (SCD). All compounds with the exception of hydrogen sulfide and carbonyl sulfide are quantitated against the initial calibration curve for methyl mercaptan. This method is not included on the laboratory's NELAP or DoD-ELAP scope of accreditation.

The results of analyses are given in the attached laboratory report. All results are intended to be considered in their entirety, and Columbia Analytical Services, Inc. dba ALS Environmental (ALS) is not responsible for utilization of less than the complete report.

Use of Columbia Analytical Services, Inc. dba ALS Environmental (ALS)'s Name. Client shall not use ALS's name or trademark in any marketing or reporting materials, press releases or in any other manner ("Materials") whatsoever and shall not attribute to ALS any test result, tolerance or specification derived from ALS's data ("Attribution") without ALS's prior written consent, which may be withheld by ALS for any reason in its sole discretion. To request ALS's consent, Client shall provide copies of the proposed Materials or Attribution and describe in writing Client's proposed use of such Materials or Attribution. If ALS has not provided written approval of the Materials or Attribution within ten (10) days of receipt from Client, Client's request to use ALS's name or trademark in any Materials or Attribution shall be deemed denied. ALS may, in its discretion, reasonably charge Client for its time in reviewing Materials or Attribution requests. Client acknowledges and agrees that the unauthorized use of ALS's name or trademark may cause ALS to incur irreparable harm for which the recovery of money damages will be inadequate. Accordingly, Client acknowledges and agrees that a violation shall justify preliminary injunctive relief. For questions contact the laboratory.

Columbia Analytical Services, Inc. dba ALS Environmental – Simi Valley

Certifications, Accreditations, and Registrations

Agency	Web Site	Number
AIHA	http://www.aihaaccreditedlabs.org	101661
Arizona DHS	http://www.azdhs.gov/lab/license/env.htm	AZ0694
DoD ELAP	http://www.pjlabs.com/search-accredited-labs	L11-203
Florida DOH (NELAP)	http://www.doh.state.fl.us/lab/EnvLabCert/WaterCert.htm	E871020
Maine DHHS	http://www.maine.gov/dhhs/mecdc/environmental-health/water/dwp-services/labcert/labcert.htm	2012039
Minnesota DOH (NELAP)	http://www.health.state.mn.us/accreditation	494864
New Jersey DEP (NELAP)	http://www.nj.gov/dep/oqa/	CA009
New York DOH (NELAP)	http://www.wadsworth.org/labcert/elap/elap.html	11221
Oregon PHD (NELAP)	http://public.health.oregon.gov/LaboratoryServices/EnvironmentalLaboratoryAccreditation/Pages/index.aspx	CA200007
Pennsylvania DEP	http://www.depweb.state.pa.us/labs	68-03307 (Registration)
Texas CEQ (NELAP)	http://www.tceq.texas.gov/field/qa/env_lab_accreditation.html	T104704413 -12-3
Utah DOH (NELAP)	http://www.health.utah.gov/lab/labimp/certification/index.html	CA01527201 2-2
Washington DOE	http://www.ecy.wa.gov/programs/eap/labs/lab-accreditation.html	C946

Analyses were performed according to our laboratory's NELAP and DoD-ELAP approved quality assurance program. A complete listing of specific NELAP and DoD-ELAP certified analytes can be found in the certifications section at www.caslab.com, www.alsglobal.com, or at the accreditation body's website.

Each of the certifications listed above have an explicit Scope of Accreditation that applies to specific matrices/methods/analytes; therefore, please contact the laboratory for information corresponding to a particular certification.

DETAIL SUMMARY REPORT

Client: CH2M Hill Service Request: P1301529
 Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

Date Received: 4/12/2013
 Time Received: 09:35

ASTM D5504-08 - Sulfur Bag

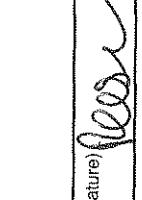
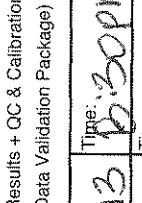
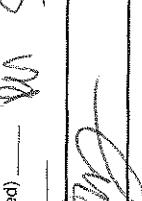
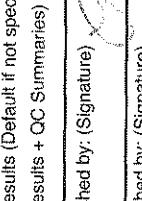
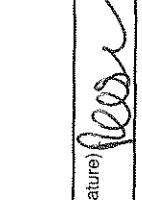
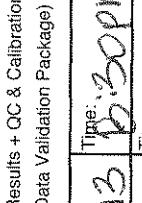
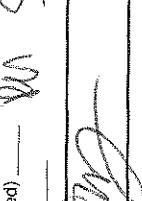
Client Sample ID	Lab Code	Matrix	Date Collected	Time Collected	
PZAA-C2a-041113	P1301529-001	Air	4/11/2013	15:50	X
PZAA-C2b-041113	P1301529-002	Air	4/11/2013	16:00	X
PZAA-C2c-041113	P1301529-003	Air	4/11/2013	16:10	X
PZAA-C1a-041113	P1301529-004	Air	4/11/2013	16:35	X
PZAA-C1b-041113	P1301529-005	Air	4/11/2013	17:05	X



Air - Chain of Custody Record & Analytical Service Request

2655 Park Center Drive, Suite A
Simi Valley, California 93065
Phone (805) 526-7161
Fax (805) 526-7270

10

Requested Turnaround Time in Business Days (Surcharges) please circle								CAS Project No.					
1 Day (100%)				2 Day (75%)				3 Day (50%)	4 Day (35%)	5 Day (25%)	10 Day-Standard		
Project Name P6201 Amvieu & Air Monitoring				Project Number 431248.AM.FW				CAS Contact K. Horvath				Comments e.g. Actual Preservative or specific Instructions	
P.O. # / Billing Information				Analysis Method									
Client Sample ID P6201-C10-C041113				Sampler (Print & Sign) Vesile Biechler									
Company Name & Address (Reporting Information)		Project Manager Yvonne Mordock		Laboratory ID Number 1	Date Collected 4/11/13	Time Collected 1550	Canister ID (Bar code # - AC, SC, etc.)	Flow Controller ID (Bar code # - FC #)	Canister Start Pressure "Hg	Canister End Pressure "Hg/psig	Sample Volume		
Phone 2167.609.0198		Fax 2167.609.9212											
Email Address for Result Reporting Yvonne.Mordock@chnm.com													
Report Tier Levels - Please select													
Tier I - Results (Default if not specified) _____		Tier II - QC & Calibration Summaries _____		Tier III (Results + QC & Calibration Summaries) _____		Tier IV (Data Validation Package) 10% Surcharge _____		Tier V (Results + QC Summaries) _____		Tier VI (Data Validation Package) _____			
Relinquished by: (Signature) 		Date: 4/11/13		Time: 12:30pm		Received by: (Signature) 		Received by: (Signature) 		Received by: (Signature) 			
Relinquished by: (Signature) 		Date: 4/11/13		Time: 12:30pm		Received by: (Signature) 		Received by: (Signature) 		Received by: (Signature) 			
Revised _____													
Report Type _____													
Project Requirements (MRLs, QAPP) _____													
Comments e.g. Actual Preservative or specific Instructions													
Cooler / Blank Temperature _____ °C													

Sample Acceptance Check Form

 Client: CH2M Hill

 Work order: P1301529

 Project: Pfizer Ambient Air Monitoring / 431248.AM.FW

 Sample(s) received on: 4/12/13

 Date opened: 4/12/13

 by: RМАRТЕNIES

Note: This form is used for all samples received by ALS. The use of this form for custody seals is strictly meant to indicate presence/absence and not as an indication of compliance or nonconformity. Thermal preservation and pH will only be evaluated either at the request of the client and/or as required by the method/SOP.

Yes No N/A

 1 Were **sample containers** properly marked with client sample ID?

 2 Container(s) **supplied by ALS?**

 3 Did **sample containers** arrive in good condition?

 4 Were **chain-of-custody** papers used and filled out?

 5 Did **sample container labels** and/or tags agree with custody papers?

 6 Was **sample volume** received adequate for analysis?

7 Are samples within specified holding times?

 8 Was proper **temperature** (thermal preservation) of cooler at receipt adhered to?

 9 Was a **trip blank** received?

 10 Were **custody seals** on outside of cooler/Box?

Location of seal(s)? _____ Sealing Lid? _____

Were signature and date included?

Were seals intact?

Were custody seals on outside of sample container?

Location of seal(s)? _____ Sealing Lid? _____

Were signature and date included?

Were seals intact?

 11 Do containers have appropriate **preservation**, according to method/SOP or Client specified information?

 Is there a client indication that the submitted samples are **pH** preserved?

 Were **VOA vials** checked for presence/absence of air bubbles?

 Does the client/method/SOP require that the analyst check the sample pH and if necessary alter it?

 12 **Tubes:** Are the tubes capped and intact?

Do they contain moisture?

 13 **Badges:** Are the badges properly capped and intact?

Are dual bed badges separated and individually capped and intact?

Lab Sample ID	Container Description	Required pH *	Received pH	Adjusted pH	VOA Headspace (Presence/Absence)	Receipt / Preservation Comments
P1301529-001.01	10 L Tedlar Bag					
P1301529-002.01	10 L Tedlar Bag					
P1301529-003.01	10 L Tedlar Bag					
P1301529-004.01	10 L Tedlar Bag					
P1301529-005.01	10 L Tedlar Bag					

Explain any discrepancies: (include lab sample ID numbers): _____

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C2a-041113

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1301529

CAS Sample ID: P1301529-001

Test Code: ASTM D 5504-08
 Instrument ID: Agilent 7890A/GC22/SCD
 Analyst: Mike Conejo
 Sample Type: 10 L Tedlar Bag
 Test Notes:

Date Collected: 4/11/13
 Time Collected: 15:50
 Date Received: 4/12/13
 Date Analyzed: 4/12/13
 Time Analyzed: 10:17
 Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C2b-041113

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1301529

CAS Sample ID: P1301529-002

Test Code: ASTM D 5504-08
 Instrument ID: Agilent 7890A/GC22/SCD
 Analyst: Mike Conejo
 Sample Type: 10 L Tedlar Bag
 Test Notes:

Date Collected: 4/11/13
 Time Collected: 16:00
 Date Received: 4/12/13
 Date Analyzed: 4/12/13
 Time Analyzed: 10:37
 Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C2c-041113

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1301529

CAS Sample ID: P1301529-003

Test Code: ASTM D 5504-08
 Instrument ID: Agilent 7890A/GC22/SCD
 Analyst: Mike Conejo
 Sample Type: 10 L Tedlar Bag
 Test Notes:

Date Collected: 4/11/13
 Time Collected: 16:10
 Date Received: 4/12/13
 Date Analyzed: 4/12/13
 Time Analyzed: 10:55
 Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C1a-041113

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1301529

CAS Sample ID: P1301529-004

Test Code: ASTM D 5504-08
 Instrument ID: Agilent 7890A/GC22/SCD
 Analyst: Mike Conejo
 Sample Type: 10 L Tedlar Bag
 Test Notes:

Date Collected: 4/11/13
 Time Collected: 16:35
 Date Received: 4/12/13
 Date Analyzed: 4/12/13
 Time Analyzed: 11:14
 Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C1b-041113

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1301529

CAS Sample ID: P1301529-005

Test Code: ASTM D 5504-08
 Instrument ID: Agilent 7890A/GC22/SCD
 Analyst: Mike Conejo
 Sample Type: 10 L Tedlar Bag
 Test Notes:

Date Collected: 4/11/13
 Time Collected: 17:05
 Date Received: 4/12/13
 Date Analyzed: 4/12/13
 Time Analyzed: 11:35
 Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: Method Blank

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1301529

CAS Sample ID: P130412-MB

Test Code: ASTM D 5504-08
 Instrument ID: Agilent 7890A/GC22/SCD
 Analyst: Mike Conejo
 Sample Type: 10 L Tedlar Bag
 Test Notes:

Date Collected: NA
 Time Collected: NA
 Date Received: NA
 Date Analyzed: 4/12/13
 Time Analyzed: 07:55
 Volume(s) Analyzed: 1.0 ml(s)

CAS #	Compound	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
7783-06-4	Hydrogen Sulfide	ND	7.0	ND	5.0	
463-58-1	Carbonyl Sulfide	ND	12	ND	5.0	
74-93-1	Methyl Mercaptan	ND	9.8	ND	5.0	
75-08-1	Ethyl Mercaptan	ND	13	ND	5.0	
75-18-3	Dimethyl Sulfide	ND	13	ND	5.0	
75-15-0	Carbon Disulfide	ND	7.8	ND	2.5	
75-33-2	Isopropyl Mercaptan	ND	16	ND	5.0	
75-66-1	tert-Butyl Mercaptan	ND	18	ND	5.0	
107-03-9	n-Propyl Mercaptan	ND	16	ND	5.0	
624-89-5	Ethyl Methyl Sulfide	ND	16	ND	5.0	
110-02-1	Thiophene	ND	17	ND	5.0	
513-44-0	Isobutyl Mercaptan	ND	18	ND	5.0	
352-93-2	Diethyl Sulfide	ND	18	ND	5.0	
109-79-5	n-Butyl Mercaptan	ND	18	ND	5.0	
624-92-0	Dimethyl Disulfide	ND	9.6	ND	2.5	
616-44-4	3-Methylthiophene	ND	20	ND	5.0	
110-01-0	Tetrahydrothiophene	ND	18	ND	5.0	
638-02-8	2,5-Dimethylthiophene	ND	23	ND	5.0	
872-55-9	2-Ethylthiophene	ND	23	ND	5.0	
110-81-6	Diethyl Disulfide	ND	12	ND	2.5	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

LABORATORY CONTROL SAMPLE SUMMARY

Page 1 of 1

Client: CH2M Hill

Client Sample ID: Lab Control Sample

Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1301529

CAS Sample ID: P130412-LCS

Test Code: ASTM D 5504-08

Date Collected: NA

Instrument ID: Agilent 7890A/GC22/SCD

Date Received: NA

Analyst: Mike Conejo

Date Analyzed: 4/12/13

Sample Type: 10 L Tedlar Bag

Volume(s) Analyzed: NA ml(s)

Test Notes:

CAS #	Compound	Spike Amount ppbV	Result ppbV	% Recovery	CAS Acceptance Limits	Data Qualifier
7783-06-4	Hydrogen Sulfide	2,050	1,820	89	63-140	
463-58-1	Carbonyl Sulfide	2,020	1,650	82	63-138	
74-93-1	Methyl Mercaptan	1,890	1,680	89	63-144	

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill
Client Project ID: Pfizer Ambient Air Monitoring / 431248.AM.FW

CAS Project ID: P1301529

Method Blank Summary

Test Code: ASTM D 5504-08
Instrument ID: Agilent 7890A/GC22/SCD Lab File ID: 04121305.d
Analyst: Mike Conejo Date Analyzed: 4/12/13
Sample Type: 10 L Tedlar Bag(s) Time Analyzed: 07:55
Test Notes:

Client Sample ID	CAS Sample ID	Lab File ID	Time Analyzed
Lab Control Sample	P130412-LCS	04121303.d	07:26
PZAA-C2a-041113	P1301529-001	04121314.d	10:17
PZAA-C2b-041113	P1301529-002	04121315.d	10:37
PZAA-C2c-041113	P1301529-003	04121316.d	10:55
PZAA-C1a-041113	P1301529-004	04121317.d	11:14
PZAA-C1b-041113	P1301529-005	04121318.d	11:35

Method Path : J:\GC22\METHODS\
Method File : GC22091212.M
Title : 20 Sulfurs Initial Calibration
Last Update : Thu Sep 13 08:52:45 2012
Response Via : Initial Calibration

Calibration Files

1	=09121233.D	2	=09121234.D	3	=09121235.D
4	=09121236.D	5	=09121237.D	6	=09121239.D

	Compound	1	2	3	4	5	6	Avg	%RSD
1)	Z Hydrogen_Sulfide	5.474	3.770	4.587	4.608	3.915	5.261	4.603	E4 14.92
2)	W Carbonyl_Sulfide	5.824	5.250	5.780	5.288	4.624	6.132	5.483	E4 9.85
3)	T Methyl_Mercaptan	4.637	4.547	5.203	4.973	4.292	6.146	4.966	E4 13.32
4)	T Ethyl_Mercaptan	4.637	4.547	5.203	4.973	4.292	6.146	4.966	E4 13.32
5)	T Dimethyl_Sulfide	4.637	4.547	5.203	4.973	4.292	6.146	4.966	E4 13.32
6)	T Carbon_Disulfide	0.927	0.909	1.041	0.995	0.858	1.229	0.993	E5 13.32
7)	T 2-Propyl_Merc...	4.637	4.547	5.203	4.973	4.292	6.146	4.966	E4 13.32
8)	T t-Butyl_Merca...	4.637	4.547	5.203	4.973	4.292	6.146	4.966	E4 13.32
9)	T Propyl_Mercaptan	4.637	4.547	5.203	4.973	4.292	6.146	4.966	E4 13.32
10)	T Ethyl_Methyl_...	4.637	4.547	5.203	4.973	4.292	6.146	4.966	E4 13.32
11)	T Thiophene	4.637	4.547	5.203	4.973	4.292	6.146	4.966	E4 13.32
12)	T i-Butyl_Merca...	4.637	4.547	5.203	4.973	4.292	6.146	4.966	E4 13.32
13)	T Diethyl_Sulfide	4.637	4.547	5.203	4.973	4.292	6.146	4.966	E4 13.32
14)	T n-Butyl_Merca...	4.637	4.547	5.203	4.973	4.292	6.146	4.966	E4 13.32
15)	T Dimethyl_Disu...	0.927	0.909	1.041	0.995	0.858	1.229	0.993	E5 13.32
16)	T 2-Methylthiop...	4.637	4.547	5.203	4.973	4.292	6.146	4.966	E4 13.32
17)	T 3-Methylthiop...	4.637	4.547	5.203	4.973	4.292	6.146	4.966	E4 13.32
18)	T Tetrahydrothi...	4.637	4.547	5.203	4.973	4.292	6.146	4.966	E4 13.32
19)	T 2,5-Dimethylt...	4.637	4.547	5.203	4.973	4.292	6.146	4.966	E4 13.32
20)	T 2-Ethylthiophene	4.637	4.547	5.203	4.973	4.292	6.146	4.966	E4 13.32
21)	T Diethyl_Disul...	0.927	0.909	1.041	0.995	0.858	1.229	0.993	E5 13.32
22)	T Methyltrisulfide	1.391	1.364	1.561	1.492	1.288	1.844	1.490	E5 13.32

(#) = Out of Range

GC22091212.M Thu Sep 13 08:52:59 2012

W417

ALS ENVIRONMETAL INC.

REPORT SUMMARY

Method : 20 Sulfurs Initial Calibration
 Client & Job# : CH2M Hill / P1301529
 Analyst : MC

Printed : 04/12/13
 Instrument : GC#22, SCD#22
 Date Acquired : 04/12/13

SAMPLE RESULT SUMMARIES (ppb)

Compounds	MDL	RL	ppbv	ppbv	% Diff	ppbv	ppbv	ppbv	ppbv	ppbv	ppbv	ppbv	ppbv	ppbv	ppbv	ppbv	% Diff
Sample Information :			Std 2000pbp S27- (03071301	Ics 2000ppb S27- 03281302	% R	mb 1ml	1529-001 1ml	1529-002 1ml	1529-003 1ml	1529-004 1ml	1529-005 1ml					std 2000ppb S27- 03071301	
Injection Volume (ml):	1.0	1.0	0.200			1.000	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	0.200	
Dilution:			1			1	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1	
Pi:			1.0			1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	
Pf:			1.0			1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	
Hydrogen_Sulfide	1.8	5.0	8532.20	15.6%	1820.8	89.0%	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	19.3%
Carbonyl_Sulfide	5.0	5.0	7769.85	21.8%	1654.2	82.0%	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	23.1%
Methyl_Mercaptan	2.4	5.0	7873.25	18.4%	1675.9	88.8%	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	21.3%
Ethyl_Mercaptan	2.4	5.0					Spike	ND	ND	ND	ND	ND	ND	ND	ND	ND	
Dimethyl_Sulfide	2.4	5.0					Amount	ND	ND	ND	ND	ND	ND	ND	ND	ND	34.10
Carbon_Disulfide	2.5	2.5					Hydrogen_Sulfide	2045.5	ND	ND	ND	ND	ND	ND	ND	ND	
2-Propyl_Mercaptan	2.4	5.0					Carbonyl_Sulfide	2017.5	ND	ND	ND	ND	ND	ND	ND	ND	
t-Butyl_Mercaptan(2-Me-2-	2.4	5.0					Methyl_Mercaptan	1887.7	ND	ND	ND	ND	ND	ND	ND	ND	
Propyl_Mercaptan	2.4	5.0					Ethyl_Methyl_Sulfide	ND	ND	ND	ND	ND	ND	ND	ND	ND	
Ethyl_Methyl_Sulfide	2.4	5.0					Thiophene	ND	ND	ND	ND	ND	ND	ND	ND	ND	
i-Butyl_Mercaptan(2-Me-1-	2.4	5.0					i-Butyl_Sulfide	ND	ND	ND	ND	ND	ND	ND	ND	ND	
Diethyl_Sulfide	2.4	5.0					n-Butyl_Mercaptan	ND	ND	ND	ND	ND	ND	ND	ND	ND	
Dimethyl_Disulfide	1.20	2.5					Dimethyl_Disulfide	ND	ND	ND	ND	ND	ND	ND	ND	ND	
2-Methyl_Thiophene	2.4	5.0					3-Methyl_Thiophene	ND	ND	ND	ND	ND	ND	ND	ND	ND	
Tetrahydrothiophene	2.4	5.0					2,5-Dimethyl_Thiophene	ND	ND	ND	ND	ND	ND	ND	ND	ND	
2-Ethyl_Thiophene	2.4	5.0					2-Ethyl_Thiophene	ND	ND	ND	ND	ND	ND	ND	ND	ND	
Diethyl_Disulfide	1.20	2.5					MethylDisulfide	ND	ND	ND	ND	ND	ND	ND	ND	ND	
MethylDisulfide								ND	ND	ND	ND	ND	ND	ND	ND	ND	

16 of 16

j = estimated concentration. Concentration greater than MDL but below RL.

Revised Page

LABORATORY REPORT

July 31, 2013

Karen Mordock
CH2M Hill
1717 Arch Street, Suite 4400
Philadelphia, PA 19103

RE: Pfizer, Bridgewater NJ

Dear Karen:

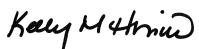
Your report number P1301548 has been amended for the samples submitted to our laboratory on April 12, 2013. The Privileged and Confidential water mark has been removed from all of the report pages. The revised pages have been indicated by the "Revised Page" footer located at the bottom right of the page.

All analyses were performed according to our laboratory's NELAP and DoD-ELAP-approved quality assurance program. The test results meet requirements of the current NELAP and DoD-ELAP standards, where applicable, and except as noted in the laboratory case narrative provided. For a specific list of NELAP and DoD-ELAP-accredited analytes, refer to the certifications section at www.caslab.com. Results are intended to be considered in their entirety and apply only to the samples analyzed and reported herein.

If you have any questions, please call me at (805) 526-7161.

Respectfully submitted,

ALS | Environmental



By Kelly Horiuchi at 8:03 pm, Jul 31, 2013

Kelly Horiuchi
Laboratory Director

Client: CH2M Hill
Project: Pfizer, Bridgewater NJ

Service Request No: P1301548

CASE NARRATIVE

The samples were received intact under chain of custody on April 12, 2013 and were stored in accordance with the analytical method requirements. Please refer to the sample acceptance check form for additional information. The results reported herein are applicable only to the condition of the samples at the time of sample receipt.

Aldehyde Analysis

The DNPH silica gel tube samples were analyzed for aldehydes according to EPA Method TO-11A using high performance liquid chromatography (HPLC). This method is not included on the laboratory's NELAP or DoD-ELAP scope of accreditation.

Polynuclear Aromatic Hydrocarbon Analysis

The low volume PUF/XAD-2 samples were analyzed for polynuclear aromatic hydrocarbons (PAHs). The extracts were analyzed according to the methodology outlined in EPA Method TO-13A using combined gas chromatography/mass spectrometry (GC/MS). However, the method was modified for the use of the low volume PUF/XAD-2 sample collection materials. This method is not included on the laboratory's DoD-ELAP scope of accreditation.

The lower control criterion was exceeded for acenaphthylene in the Duplicate Laboratory Control Sample (LCSD) analyzed on April 19, 2013. The error associated with reduced recovery equates to a potential low bias; however, the laboratory control sample (LCS) was analyzed and the recovery for the analyte in question meets the acceptance limits. In addition, surrogate recoveries for all field samples met control criterion. The compound(s) were not detected in the field sample(s) and the LCS was acceptable, therefore, the data quality is not significantly affected. No further corrective action was taken.

NELAC requirements for compliance with EPA TO-13A state a duplicate sample must be analyzed. However, this is dependent upon the client submitting a secondary sample for extraction and analysis. Sample extraction was performed at the laboratory's off-site extraction facility located at 2360 Shasta Way, Suite G, Simi Valley, CA 93065.

The results of analyses are given in the attached laboratory report. All results are intended to be considered in their entirety, and Columbia Analytical Services, Inc. dba ALS Environmental (ALS) is not responsible for utilization of less than the complete report.

Use of Columbia Analytical Services, Inc. dba ALS Environmental (ALS)'s Name. Client shall not use ALS's name or trademark in any marketing or reporting materials, press releases or in any other manner ("Materials") whatsoever and shall not attribute to ALS any test result, tolerance or specification derived from ALS's data ("Attribution") without ALS's prior written consent, which may be withheld by ALS for any reason in its sole discretion. To request ALS's consent, Client shall provide copies of the proposed Materials or Attribution and describe in writing Client's proposed use of such Materials or Attribution. If ALS has not provided written approval of the Materials or Attribution within ten (10) days of receipt from Client, Client's request to use ALS's name or trademark in any Materials or Attribution shall be deemed denied. ALS may, in its discretion, reasonably charge Client for its time in reviewing Materials or Attribution requests. Client acknowledges and agrees that the unauthorized use of ALS's name or trademark may cause ALS to incur irreparable harm for which the recovery of money damages will be inadequate. Accordingly, Client acknowledges and agrees that a violation shall justify preliminary injunctive relief. For questions contact the laboratory.

Columbia Analytical Services, Inc. dba ALS Environmental – Simi Valley

Certifications, Accreditations, and Registrations

Agency	Web Site	Number
AIHA	http://www.aihaaccreditedlabs.org	101661
Arizona DHS	http://www.azdhs.gov/lab/license/env.htm	AZ0694
DoD ELAP	http://www.pjlabs.com/search-accredited-labs	L11-203
Florida DOH (NELAP)	http://www.doh.state.fl.us/lab/EnvLabCert/WaterCert.htm	E871020
Maine DHHS	http://www.maine.gov/dhhs/mecdc/environmental-health/water/dwp-services/labcert/labcert.htm	2012039
Minnesota DOH (NELAP)	http://www.health.state.mn.us/accreditation	494864
New Jersey DEP (NELAP)	http://www.nj.gov/dep/oqa/	CA009
New York DOH (NELAP)	http://www.wadsworth.org/labcert/elap/elap.html	11221
Oregon PHD (NELAP)	http://public.health.oregon.gov/LaboratoryServices/EnvironmentalLaboratoryAccreditation/Pages/index.aspx	CA200007
Pennsylvania DEP	http://www.depweb.state.pa.us/labs	68-03307 (Registration)
Texas CEQ (NELAP)	http://www.tceq.texas.gov/field/qa/env_lab_accreditation.html	T104704413 -12-3
Utah DOH (NELAP)	http://www.health.utah.gov/lab/labimp/certification/index.html	CA01527201 2-2
Washington DOE	http://www.ecy.wa.gov/programs/eap/labs/lab-accreditation.html	C946

Analyses were performed according to our laboratory's NELAP and DoD-ELAP approved quality assurance program. A complete listing of specific NELAP and DoD-ELAP certified analytes can be found in the certifications section at www.caslab.com, www.alsglobal.com, or at the accreditation body's website.

Each of the certifications listed above have an explicit Scope of Accreditation that applies to specific matrices/methods/analytes; therefore, please contact the laboratory for information corresponding to a particular certification.

DETAIL SUMMARY REPORT

Client: CH2M Hill
 Project ID: Pfizer, Bridgewater NJ

Service Request: P1301548

Date Received: 4/12/2013
 Time Received: 09:35

TO-13A Modified - PAH SIM Low Vol	TO-11A - Carbonyls
-----------------------------------	--------------------

Client Sample ID	Lab Code	Matrix	Date Collected	Time Collected	
PZAA-C1-041013	P1301548-001	Air	4/10/2013	15:08	X
PZAA-C1-041013	P1301548-002	Air	4/10/2013	15:08	X
PZAA-C2-041013	P1301548-003	Air	4/10/2013	15:50	X
PZAA-C2-041013	P1301548-004	Air	4/10/2013	15:50	X
PZAA-C3-041013	P1301548-005	Air	4/10/2013	14:57	X
PZAA-C3-041013	P1301548-006	Air	4/10/2013	14:57	X
PZAA-C3-041013-D	P1301548-007	Air	4/10/2013	14:57	X
PZAA-C3-041013-D	P1301548-008	Air	4/10/2013	14:57	X
PZAA-FB1-041013	P1301548-010	Air	4/10/2013	15:32	X
PZAA-FB1-041013	P1301548-011	Air	4/10/2013	15:32	X



ANALYTICAL REQUEST FORM

1701

 REGULAR Status RUSH Status Required - ADDITIONAL CHARGE

RESULTS REQUIRED BY _____

DATE _____

CONTACT ALS LABORATORY GROUP PRIOR TO SENDING SAMPLES

Date 4/11/13 Purchase Order No. _____

Billing Address (if different) _____

Company Name CH2M HillAddress 1717 Arch Street St 4400
Philadelphia PA 19103

City _____ State _____ Zip _____

Send Report To Karen Mordock

Quote No. _____

Email Address Karen.Mordock@ch2m.comSampling Site Phiar; Bridge water NJTelephone (216) 685. 0198Date/Time of Collection 4/9 - 4/10/2013Fax Telephone (215) 640. 9212Project No. 4/10 - 4/11 :PM 10

Lab Use Only	Client Sample Number	Media Type	Sample Volume (Liters)	ANALYSES REQUESTED - Use Method Number if Known
①	PZAA-C1-041013	Air	7136	TO-13A (PAHs)-Low Volume-puf/XAD Tube LX-9
②	PZAA-C1-041013	Air	871	TO-11A (Aldehydes)sorbent tube
③	PZAA-C2-041013	Air	7321	TO-13A (PAHs) LV-puf/XAD tube LX-34
④	PZAA-C2-041013	Air	9167	TO-11A (Aldehydes) Sorbent tube
⑤	PZAA-C3-041013	Air	7211	TO-13A(PAHs) LV-PUF/XAD TUBE LX-10
⑥	PZAA-C3-041013	Air	1756	TO-11A (Aldehydes) Sorbent tube
⑦	PZAA-C3-041013-D	Air	7211	TO-13A (PAHs) LV PUF/XAD TUBE LX-32
⑧	PZAA-C3-041013-D	Air	1756	TO-11A (Aldehydes) Sorbent tube
⑨	PZAA-C3-041013	Air	24048	PM10 (particulate) 47mm glass fiber filter QFL44
⑩	PZAA-FBI-041013 *	Air		TO-13A (PAHs) LV PUF/XAD TUBE LX-38
⑪	PZAA-FBI-041013 *	Air		TO-11A (Aldehydes) Sorbent TUBE
				Just opened tube - grab sample.

Failure to complete all portions of this form may delay analysis. Please fill in this form **LEGIBLY**.

CHAIN OF CUSTODY

Relinquished by: (Signature) <i>JM</i>	Date / Time 4/11/13 8:30	Received by: (Signature) <i>W. A. Wallace</i>	Date / Time 4/11/13 09:55
Relinquished by: (Signature)	Date / Time	Received by: (Signature)	Date / Time

Sample Acceptance Check Form

Client: CH2M Hill

Work order: P1301548

Project: Pfizer, Bridgewater NJ

Sample(s) received on: 4/12/13

Date opened: 4/12/13

by: MZAMORA

Note: This form is used for all samples received by ALS. The use of this form for custody seals is strictly meant to indicate presence/absence and not as an indication of compliance or nonconformity. Thermal preservation and pH will only be evaluated either at the request of the client and/or as required by the method/SOP.

Yes No N/A

- 1 Were **sample containers** properly marked with client sample ID?
- 2 Container(s) **supplied by ALS?**
- 3 Did **sample containers** arrive in good condition?
- 4 Were **chain-of-custody** papers used and filled out?
- 5 Did **sample container labels** and/or tags agree with custody papers?
- 6 Was **sample volume** received adequate for analysis?
- 7 Are samples within specified holding times?
- 8 Was proper **temperature** (thermal preservation) of cooler at receipt adhered to?

Cooler Temperature: 6° C Blank Temperature: ° C

Gel Packs

- 9 Was a **trip blank** received?
- 10 Were **custody seals** on outside of cooler/Box?

Location of seal(s)?

Sealing Lid?

 Were signature and date included?

 Were seals intact?

 Were custody seals on outside of sample container?

Location of seal(s)?

Sealing Lid?

 Were signature and date included?

 Were seals intact?

 11 Do containers have appropriate **preservation**, according to method/SOP or Client specified information?

 Is there a client indication that the submitted samples are **pH** preserved?

 Were **VOA vials** checked for presence/absence of air bubbles?

 Does the client/method/SOP require that the analyst check the sample pH and if necessary alter it?

 12 **Tubes:** Are the tubes capped and intact?

 Do they contain moisture?

 13 **Badges:** Are the badges properly capped and intact?

 Are dual bed badges separated and individually capped and intact?

Lab Sample ID	Container Description	Required pH *	Received pH	Adjusted pH	VOA Headspace (Presence/Absence)	Receipt / Preservation Comments
P1301548-001.01	PUF/XAD-2 (Low Vol)					
P1301548-002.01	Silica Gel DNPH Tube					
P1301548-003.01	PUF/XAD-2 (Low Vol)					
P1301548-004.01	Silica Gel DNPH Tube					
P1301548-005.01	PUF/XAD-2 (Low Vol)					
P1301548-006.01	Silica Gel DNPH Tube					
P1301548-007.01	PUF/XAD-2 (Low Vol)					
P1301548-008.01	Silica Gel DNPH Tube					

Explain any discrepancies: (include lab sample ID numbers):

Sample Acceptance Check Form

Client: CH2M Hill

Work order: P1301548

Project: Pfizer, Bridgewater NJ

Sample(s) received on: 4/12/13

Date opened: 4/12/13

by: MZAMORA

Explain any discrepancies: (include lab sample ID numbers):

RSK - MEEPP, HCl (pH<2); RSK - CO₂, (pH 5-8); Sulfur (pH>4)

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C1-041013

Client Project ID: Pfizer, Bridgewater NJ

CAS Project ID: P1301548

CAS Sample ID: P1301548-002

Test Code: EPA Method TO-11A
 Instrument ID: Agilent Infinity LC 1220/LC3
 Analyst: Evelyn Ibarra
 Sample Type: Silica Gel DNPH Tube
 Test Notes: BC

Date Collected: 4/10/13
 Date Received: 4/12/13
 Date Analyzed: 4/19/13
 Desorption Volume: 1.0 ml
 Volume Sampled: 871 Liter(s)

CAS #	Compound	Result ng/Sample	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
50-00-0	Formaldehyde	1,400	1.6	0.11	1.3	0.094	BT
75-07-0	Acetaldehyde	6,400	7.4	0.11	4.1	0.064	BT
123-38-6	Propionaldehyde	< 100	ND	0.11	ND	0.048	
4170-30-3	Crotonaldehyde, Total	< 100	ND	0.11	ND	0.040	
123-72-8	Butyraldehyde	< 100	ND	0.11	ND	0.039	
100-52-7	Benzaldehyde	100	0.12	0.11	0.027	0.026	
590-86-3	Isovaleraldehyde	< 100	ND	0.11	ND	0.033	
110-62-3	Valeraldehyde	260	0.30	0.11	0.085	0.033	
529-20-4	o-Tolualdehyde	< 100	ND	0.11	ND	0.023	
620-23-5							
104-87-0	m,p-Tolualdehyde	< 200	ND	0.23	ND	0.047	
66-25-1	n-Hexaldehyde	500	0.58	0.11	0.14	0.028	
5779-94-2	2,5-Dimethylbenzaldehyde	< 100	ND	0.11	ND	0.021	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

BC = Results reported are not blank corrected.

BT = Results indicated possible breakthrough; back section > 10% front section.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C2-041013

Client Project ID: Pfizer, Bridgewater NJ

CAS Project ID: P1301548

CAS Sample ID: P1301548-004

Test Code: EPA Method TO-11A
 Instrument ID: Agilent Infinity LC 1220/LC3
 Analyst: Evelyn Ibarra
 Sample Type: Silica Gel DNPH Tube
 Test Notes: BC

Date Collected: 4/10/13
 Date Received: 4/12/13
 Date Analyzed: 4/19/13
 Desorption Volume: 1.0 ml
 Volume Sampled: 867 Liter(s)

CAS #	Compound	Result ng/Sample	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
50-00-0	Formaldehyde	2,000	2.3	0.12	1.8	0.094	BT
75-07-0	Acetaldehyde	5,200	6.0	0.12	3.4	0.064	BT
123-38-6	Propionaldehyde	< 100	ND	0.12	ND	0.049	
4170-30-3	Crotonaldehyde, Total	< 100	ND	0.12	ND	0.040	
123-72-8	Butyraldehyde	210	0.24	0.12	0.080	0.039	M
100-52-7	Benzaldehyde	150	0.17	0.12	0.039	0.027	
590-86-3	Isovaleraldehyde	< 100	ND	0.12	ND	0.033	
110-62-3	Valeraldehyde	330	0.38	0.12	0.11	0.033	
529-20-4	o-Tolualdehyde	< 100	ND	0.12	ND	0.023	
620-23-5							
104-87-0	m,p-Tolualdehyde	< 200	ND	0.23	ND	0.047	
66-25-1	n-Hexaldehyde	530	0.61	0.12	0.15	0.028	
5779-94-2	2,5-Dimethylbenzaldehyde	< 100	ND	0.12	ND	0.021	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

BC = Results reported are not blank corrected.

BT = Results indicated possible breakthrough; back section > 10% front section.

M = Matrix interference; results may be biased high.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C3-041013

Client Project ID: Pfizer, Bridgewater NJ

CAS Project ID: P1301548

CAS Sample ID: P1301548-006

Test Code: EPA Method TO-11A
 Instrument ID: Agilent Infinity LC 1220/LC3
 Analyst: Evelyn Ibarra
 Sample Type: Silica Gel DNPH Tube
 Test Notes: BC

Date Collected: 4/10/13
 Date Received: 4/12/13
 Date Analyzed: 4/19/13
 Desorption Volume: 1.0 ml
 Volume Sampled: 1756 Liter(s)

CAS #	Compound	Result ng/Sample	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
50-00-0	Formaldehyde	2,700	1.5	0.057	1.3	0.046	
75-07-0	Acetaldehyde	2,400	1.4	0.057	0.75	0.032	BT
123-38-6	Propionaldehyde	< 100	ND	0.057	ND	0.024	
4170-30-3	Crotonaldehyde, Total	< 100	ND	0.057	ND	0.020	
123-72-8	Butyraldehyde	190	0.11	0.057	0.037	0.019	
100-52-7	Benzaldehyde	150	0.087	0.057	0.020	0.013	
590-86-3	Isovaleraldehyde	< 100	ND	0.057	ND	0.016	
110-62-3	Valeraldehyde	210	0.12	0.057	0.034	0.016	
529-20-4	o-Tolualdehyde	170	0.096	0.057	0.020	0.012	
620-23-5							
104-87-0	m,p-Tolualdehyde	< 200	ND	0.11	ND	0.023	
66-25-1	n-Hexaldehyde	920	0.52	0.057	0.13	0.014	
5779-94-2	2,5-Dimethylbenzaldehyde	< 100	ND	0.057	ND	0.010	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

BC = Results reported are not blank corrected.

BT = Results indicated possible breakthrough; back section > 10% front section.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C3-041013-D

Client Project ID: Pfizer, Bridgewater NJ

CAS Project ID: P1301548

CAS Sample ID: P1301548-008

Test Code: EPA Method TO-11A
 Instrument ID: Agilent Infinity LC 1220/LC3
 Analyst: Evelyn Ibarra
 Sample Type: Silica Gel DNPH Tube
 Test Notes: BC

Date Collected: 4/10/13
 Date Received: 4/12/13
 Date Analyzed: 4/19/13
 Desorption Volume: 1.0 ml
 Volume Sampled: 1756 Liter(s)

CAS #	Compound	Result ng/Sample	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
50-00-0	Formaldehyde	2,300	1.3	0.057	1.1	0.046	BT
75-07-0	Acetaldehyde	6,200	3.5	0.057	2.0	0.032	BT
123-38-6	Propionaldehyde	< 100	ND	0.057	ND	0.024	
4170-30-3	Crotonaldehyde, Total	< 100	ND	0.057	ND	0.020	
123-72-8	Butyraldehyde	< 100	ND	0.057	ND	0.019	
100-52-7	Benzaldehyde	130	0.072	0.057	0.017	0.013	
590-86-3	Isovaleraldehyde	< 100	ND	0.057	ND	0.016	
110-62-3	Valeraldehyde	< 100	ND	0.057	ND	0.016	
529-20-4	o-Tolualdehyde	< 100	ND	0.057	ND	0.012	
620-23-5							
104-87-0	m,p-Tolualdehyde	< 200	ND	0.11	ND	0.023	
66-25-1	n-Hexaldehyde	780	0.44	0.057	0.11	0.014	
5779-94-2	2,5-Dimethylbenzaldehyde	< 100	ND	0.057	ND	0.010	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

BC = Results reported are not blank corrected.

BT = Results indicated possible breakthrough; back section > 10% front section.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-FB1-041013

Client Project ID: Pfizer, Bridgewater NJ

CAS Project ID: P1301548

CAS Sample ID: P1301548-011

Test Code: EPA Method TO-11A
 Instrument ID: Agilent Infinity LC 1220/LC3
 Analyst: Evelyn Ibarra
 Sample Type: Silica Gel DNPH Tube
 Test Notes: BC

Date Collected: 4/10/13
 Date Received: 4/12/13
 Date Analyzed: 4/19/13
 Desorption Volume: 1.0 ml
 Volume Sampled: NA Liter(s)

CAS #	Compound	Result ng/Sample	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
50-00-0	Formaldehyde	< 100	NA	NA	NA	NA	
75-07-0	Acetaldehyde	< 100	NA	NA	NA	NA	
123-38-6	Propionaldehyde	< 100	NA	NA	NA	NA	
4170-30-3	Crotonaldehyde, Total	< 100	NA	NA	NA	NA	
123-72-8	Butyraldehyde	< 100	NA	NA	NA	NA	
100-52-7	Benzaldehyde	< 100	NA	NA	NA	NA	
590-86-3	Isovaleraldehyde	< 100	NA	NA	NA	NA	
110-62-3	Valeraldehyde	< 100	NA	NA	NA	NA	
529-20-4	o-Tolualdehyde	< 100	NA	NA	NA	NA	
620-23-5							
104-87-0	m,p-Tolualdehyde	< 200	NA	NA	NA	NA	
66-25-1	n-Hexaldehyde	< 100	NA	NA	NA	NA	
5779-94-2	2,5-Dimethylbenzaldehyde	< 100	NA	NA	NA	NA	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

BC = Results reported are not blank corrected.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: Method Blank

Client Project ID: Pfizer, Bridgewater NJ

CAS Project ID: P1301548

CAS Sample ID: P130419-MB

Test Code: EPA Method TO-11A
 Instrument ID: Agilent Infinity LC 1220/LC3
 Analyst: Evelyn Ibarra
 Sample Type: Silica Gel DNPH Tube
 Test Notes: BC

Date Collected: NA
 Date Received: NA
 Date Analyzed: 04/19/13
 Desorption Volume: 1.0 ml
 Volume Sampled: NA Liter(s)

CAS #	Compound	Result ng/Sample	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
50-00-0	Formaldehyde	< 100	NA	NA	NA	NA	
75-07-0	Acetaldehyde	< 100	NA	NA	NA	NA	
123-38-6	Propionaldehyde	< 100	NA	NA	NA	NA	
4170-30-3	Crotonaldehyde, Total	< 100	NA	NA	NA	NA	
123-72-8	Butyraldehyde	< 100	NA	NA	NA	NA	
100-52-7	Benzaldehyde	< 100	NA	NA	NA	NA	
590-86-3	Isovaleraldehyde	< 100	NA	NA	NA	NA	
110-62-3	Valeraldehyde	< 100	NA	NA	NA	NA	
529-20-4	o-Tolualdehyde	< 100	NA	NA	NA	NA	
620-23-5							
104-87-0	m,p-Tolualdehyde	< 200	NA	NA	NA	NA	
66-25-1	n-Hexaldehyde	< 100	NA	NA	NA	NA	
5779-94-2	2,5-Dimethylbenzaldehyde	< 100	NA	NA	NA	NA	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

BC = Results reported are not blank corrected.

NA = Not applicable.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill
Client Project ID: Pfizer, Bridgewater NJ

CAS Project ID: P1301548

Method Blank Summary

Test Code:	EPA Method TO-11A	
Instrument ID:	Agilent Infinity LC 1220/LC3	Lab File ID: 0419130000006.D
Analyst:	Evelyn Ibarra	Date Analyzed: 04/19/13
Sample Type:	Silica Gel DNPH Tube	Time Analyzed: 15:12
Test Notes:		

Client Sample ID	CAS Sample ID	Lab File ID	Time Analyzed
PZAA-C1-041013 (Back)	P1301548-002	0419130000007.D	15:21
PZAA-C2-041013 (Back)	P1301548-004	0419130000008.D	15:31
PZAA-C3-041013 (Back)	P1301548-006	0419130000009.D	15:40
PZAA-C3-041013-D (Back)	P1301548-008	0419130000010.D	15:49
PZAA-FB1-041013 (Back)	P1301548-011	0419130000012.D	16:08
PZAA-C1-041013 (Front)	P1301548-002	0419130000021.D	17:33
PZAA-C2-041013 (Front)	P1301548-004	0419130000023.D	17:51
PZAA-C3-041013 (Front)	P1301548-006	0419130000025.D	18:10
PZAA-C3-041013-D (Front)	P1301548-008	0419130000027.D	18:29
PZAA-FB1-041013 (Front)	P1301548-011	0419130000029.D	18:48

Response Factor Report GCI

Method Path : J:\LC03\METHODS\

Method File : TO11A101512E.M

Title : TO-11A Method for Aldehydes/Ketones by HPLC

Last Update : Fri Oct 19 11:48:51 2012

Response Via : Initial Calibration

Calibration Files

50	=1015120000009.D	100	=1015120000012.D	500	=1015120000015.D
1500	=1015120000018.D	5000	=1015120000021.D	10	=1015120000024.D

	Compound	50	100	500	1500	5000	10	Avg	%RSD
<hr/>									
1)	Formaldehyde	2.155	2.158	2.199	2.218	2.203	2.156	2.182 E4	1.31
2)	Acetaldehyde	1.649	1.625	1.640	1.647	1.635	1.601	1.633 E4	1.09
3)	Acetone	1.183	1.196	1.190	1.197	1.189	1.166	1.187 E4	0.97
4)	Acrolein	1.445	1.447	1.450	1.461	1.453	1.422	1.446 E4	0.90
5)	Propionaldehyde	1.246	1.247	1.252	1.260	1.253	1.227	1.248 E4	0.89
6)	Crotonaldehyde	1.067	1.060	1.057	1.067	1.062	1.040	1.059 E4	0.95
7)	Butyraldehyde	1.030	1.016	1.006	1.021	1.017	0.998	1.015 E4	1.10
8)	Benzaldehyde	6.979	6.993	7.109	7.185	7.159	7.029	7.076 E3	1.24
9)	Isovaleraldehyde	8.878	8.499	8.679	8.720	8.669	8.513	8.660 E3	1.63
10)	Valeraldehyde	8.652	8.474	8.593	8.646	8.612	8.457	8.572 E3	1.00
11)	o-Tolualdehyde	4.322	4.298	4.697	4.918	5.144	5.203	4.764 E3	8.28
12)	m,p-Tolualdehyde	6.216	6.383	6.616	6.681	6.573	6.382	6.475 E3	2.73
13)	Hexaldehyde	7.354	7.269	7.364	7.436	7.429	7.298	7.358 E3	0.92
14)	2,5-Dimethylb...	4.359	4.988	5.204	5.376	5.450	5.371	5.125 E3	8.00

(#= Out of Range

TO11A101512E.M Fri Oct 19 11:48:56 2012

ALS Environmental

TO11A Aldehyde & Ketone DNPH Analysis by HPLC
 Instrument : LC 03 Printed : 4/23/2013
 Detector : UV-VIS 360 Date Acquired : 4/19/2013
 Analyst : EI/LH Sample Amount : 2.5uL
 Client & Job# : CH2M Hill P1301548

QC

Sample Information		QC				TO-11A 1500ng/ml S26-01301301				TO-11A 1500ng/ml S26-01301301			
MRL	% Diff	ACN Blank lot DE483	MB Back lot777677872 1.0ml	MB Front lot777677872 1.0ml	0	0	0	1.0	1.0	NA	NA	% Diff	% Diff
Dilution	1.0	NA	1.0	1.0	1.0	0	0	1.0	1.0	NA	NA		
Sample Volume (L)	1.0		NA	NA	NA								
Final Vol.(mL)	1.0		1.0	1.0	1.0								
Data File	0419130000 003.D		041913000000 4.D	041913000000 5.D	041913000000 6.D	0.0	0.0	0.0	0.0	0419130000 017.D	0419130000 034.D	0.0	0.0
ng/sample		ng/sample	ng/sample	ng/sample	ng/sample	ng/sample	ng/sample	ng/sample	ng/sample	ng/sample	ng/sample	ng/sample	ng/sample
Formaldehyde	100.00	1403.3	6.4%	ND	ND	ND	ND	ND	ND	1410.4	1418.0	6.0%	5.5%
Acetaldehyde	100.00	1446.9	3.5%	ND	ND	ND	ND	ND	ND	1453.1	1461.1	3.1%	2.6%
Propionaldehyde	100.00	1474.9	1.7%	ND	ND	ND	ND	ND	ND	1486.0	1493.2	0.9%	0.5%
Crotonaldehyde	100.00	1475.7	1.6%	ND	ND	ND	ND	ND	ND	1479.8	1487.8	1.3%	0.8%
Butyraldehyde	100.00	1518.7	1.2%	ND	ND	ND	ND	ND	ND	1519.2	1528.3	1.3%	1.9%
Benzaldehyde	100.00	1476.4	1.6%	ND	ND	ND	ND	ND	ND	1489.3	1511.3	0.7%	0.8%
Isovaleraldehyde	100.00	1496.1	0.3%	ND	ND	ND	ND	ND	ND	1505.0	1521.4	0.3%	1.4%
Valeraldehyde	100.00	1487.9	0.8%	ND	ND	ND	ND	ND	ND	1502.2	1517.5	0.1%	1.2%
o-Tolualdehyde	100.00	1707.2	13.8%	ND	ND	ND	ND	ND	ND	1692.0	1715.6	12.8%	14.4%
m,p-Tolualdehyde	200.00	2820.7	6.0%	ND	ND	ND	ND	ND	ND	2843.5	2855.5	5.2%	4.8%
Hexaldehyde	100.00	1503.5	0.6%	ND	ND	ND	ND	ND	ND	1509.7	1513.0	0.6%	0.9%
2,5-Dimethylbenzaldehyde	100.00	1478.4	1.4%	ND	ND	ND	ND	ND	ND	1499.7	1484.5	0.0%	1.0%

4/23/13

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C1-041013

Client Project ID: Pfizer, Bridgewater NJ

CAS Project ID: P1301548

CAS Sample ID: P1301548-001

Test Code: EPA TO-13A Modified

Date Collected: 4/10/13

Instrument ID: HP 5890II+/HP5972A/MS15

Date Received: 4/12/13

Analyst: Madeleine Dangazyan

Date Extracted: 4/17/13

Sampling Media: PUF/XAD-2 (Low Volume) Cartridge

Date Analyzed: 4/19/13

Test Notes:

Final Volume: 1.0 ml

Volume Sampled: 7136 Liter(s)

CAS #	Compound	Result µg/Cartridge	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
91-20-3	Naphthalene	< 5.0	ND	0.70	ND	0.13	
208-96-8	Acenaphthylene	< 0.50	ND	0.070	ND	0.011	L
83-32-9	Acenaphthene	< 0.50	ND	0.070	ND	0.011	
86-73-7	Fluorene	< 0.50	ND	0.070	ND	0.010	
85-01-8	Phenanthrene	< 0.50	ND	0.070	ND	0.0096	
120-12-7	Anthracene	< 0.50	ND	0.070	ND	0.0096	
206-44-0	Fluoranthene	< 0.50	ND	0.070	ND	0.0085	
129-00-0	Pyrene	< 0.50	ND	0.070	ND	0.0085	
56-55-3	Benz(a)anthracene	< 0.50	ND	0.070	ND	0.0075	
218-01-9	Chrysene	< 0.50	ND	0.070	ND	0.0075	
205-99-2	Benzo(b)fluoranthene	< 0.50	ND	0.070	ND	0.0068	
207-08-9	Benzo(k)fluoranthene	< 0.50	ND	0.070	ND	0.0068	
50-32-8	Benzo(a)pyrene	< 0.50	ND	0.070	ND	0.0068	
193-39-5	Indeno(1,2,3-cd)pyrene	< 0.50	ND	0.070	ND	0.0062	
53-70-3	Dibenz(a,h)anthracene	< 0.50	ND	0.070	ND	0.0062	
191-24-2	Benzo(g,h,i)perylene	< 0.50	ND	0.070	ND	0.0062	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

L = Laboratory control sample recovery outside the specified limits, results may be biased low.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C2-041013

Client Project ID: Pfizer, Bridgewater NJ

CAS Project ID: P1301548

CAS Sample ID: P1301548-003

Test Code: EPA TO-13A Modified

Date Collected: 4/10/13

Instrument ID: HP 5890II+/HP5972A/MS15

Date Received: 4/12/13

Analyst: Madeleine Dangazyan

Date Extracted: 4/17/13

Sampling Media: PUF/XAD-2 (Low Volume) Cartridge

Date Analyzed: 4/19/13

Test Notes:

Final Volume: 1.0 ml

Volume Sampled: 7321 Liter(s)

CAS #	Compound	Result µg/Cartridge	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
91-20-3	Naphthalene	< 5.0	ND	0.68	ND	0.13	
208-96-8	Acenaphthylene	< 0.50	ND	0.068	ND	0.011	L
83-32-9	Acenaphthene	< 0.50	ND	0.068	ND	0.011	
86-73-7	Fluorene	< 0.50	ND	0.068	ND	0.010	
85-01-8	Phenanthrene	< 0.50	ND	0.068	ND	0.0094	
120-12-7	Anthracene	< 0.50	ND	0.068	ND	0.0094	
206-44-0	Fluoranthene	< 0.50	ND	0.068	ND	0.0083	
129-00-0	Pyrene	< 0.50	ND	0.068	ND	0.0083	
56-55-3	Benz(a)anthracene	< 0.50	ND	0.068	ND	0.0073	
218-01-9	Chrysene	< 0.50	ND	0.068	ND	0.0073	
205-99-2	Benzo(b)fluoranthene	< 0.50	ND	0.068	ND	0.0066	
207-08-9	Benzo(k)fluoranthene	< 0.50	ND	0.068	ND	0.0066	
50-32-8	Benzo(a)pyrene	< 0.50	ND	0.068	ND	0.0066	
193-39-5	Indeno(1,2,3-cd)pyrene	< 0.50	ND	0.068	ND	0.0060	
53-70-3	Dibenz(a,h)anthracene	< 0.50	ND	0.068	ND	0.0060	
191-24-2	Benzo(g,h,i)perylene	< 0.50	ND	0.068	ND	0.0060	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

L = Laboratory control sample recovery outside the specified limits, results may be biased low.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C3-041013

Client Project ID: Pfizer, Bridgewater NJ

CAS Project ID: P1301548

CAS Sample ID: P1301548-005

Test Code: EPA TO-13A Modified

Date Collected: 4/10/13

Instrument ID: HP 5890II+/HP5972A/MS15

Date Received: 4/12/13

Analyst: Madeleine Dangazyan

Date Extracted: 4/17/13

Sampling Media: PUF/XAD-2 (Low Volume) Cartridge

Date Analyzed: 4/19/13

Test Notes:

Final Volume: 1.0 ml

Volume Sampled: 7211 Liter(s)

CAS #	Compound	Result µg/Cartridge	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
91-20-3	Naphthalene	< 5.0	ND	0.69	ND	0.13	
208-96-8	Acenaphthylene	< 0.50	ND	0.069	ND	0.011	L
83-32-9	Acenaphthene	< 0.50	ND	0.069	ND	0.011	
86-73-7	Fluorene	< 0.50	ND	0.069	ND	0.010	
85-01-8	Phenanthrene	< 0.50	ND	0.069	ND	0.0095	
120-12-7	Anthracene	< 0.50	ND	0.069	ND	0.0095	
206-44-0	Fluoranthene	< 0.50	ND	0.069	ND	0.0084	
129-00-0	Pyrene	< 0.50	ND	0.069	ND	0.0084	
56-55-3	Benz(a)anthracene	< 0.50	ND	0.069	ND	0.0074	
218-01-9	Chrysene	< 0.50	ND	0.069	ND	0.0074	
205-99-2	Benzo(b)fluoranthene	< 0.50	ND	0.069	ND	0.0067	
207-08-9	Benzo(k)fluoranthene	< 0.50	ND	0.069	ND	0.0067	
50-32-8	Benzo(a)pyrene	< 0.50	ND	0.069	ND	0.0067	
193-39-5	Indeno(1,2,3-cd)pyrene	< 0.50	ND	0.069	ND	0.0061	
53-70-3	Dibenz(a,h)anthracene	< 0.50	ND	0.069	ND	0.0061	
191-24-2	Benzo(g,h,i)perylene	< 0.50	ND	0.069	ND	0.0061	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

L = Laboratory control sample recovery outside the specified limits, results may be biased low.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-C3-041013-D

Client Project ID: Pfizer, Bridgewater NJ

CAS Project ID: P1301548

CAS Sample ID: P1301548-007

Test Code: EPA TO-13A Modified
 Instrument ID: HP 5890II+/HP5972A/MS15
 Analyst: Madeleine Dangazyan
 Sampling Media: PUF/XAD-2 (Low Volume) Cartridge
 Test Notes:

Date Collected: 4/10/13
 Date Received: 4/12/13
 Date Extracted: 4/17/13
 Date Analyzed: 4/19/13
 Final Volume: 1.0 ml
 Volume Sampled: 7211 Liter(s)

CAS #	Compound	Result µg/Cartridge	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
91-20-3	Naphthalene	< 5.0	ND	0.69	ND	0.13	
208-96-8	Acenaphthylene	< 0.50	ND	0.069	ND	0.011	L
83-32-9	Acenaphthene	< 0.50	ND	0.069	ND	0.011	
86-73-7	Fluorene	< 0.50	ND	0.069	ND	0.010	
85-01-8	Phenanthrene	< 0.50	ND	0.069	ND	0.0095	
120-12-7	Anthracene	< 0.50	ND	0.069	ND	0.0095	
206-44-0	Fluoranthene	< 0.50	ND	0.069	ND	0.0084	
129-00-0	Pyrene	< 0.50	ND	0.069	ND	0.0084	
56-55-3	Benz(a)anthracene	< 0.50	ND	0.069	ND	0.0074	
218-01-9	Chrysene	< 0.50	ND	0.069	ND	0.0074	
205-99-2	Benzo(b)fluoranthene	< 0.50	ND	0.069	ND	0.0067	
207-08-9	Benzo(k)fluoranthene	< 0.50	ND	0.069	ND	0.0067	
50-32-8	Benzo(a)pyrene	< 0.50	ND	0.069	ND	0.0067	
193-39-5	Indeno(1,2,3-cd)pyrene	< 0.50	ND	0.069	ND	0.0061	
53-70-3	Dibenz(a,h)anthracene	< 0.50	ND	0.069	ND	0.0061	
191-24-2	Benzo(g,h,i)perylene	< 0.50	ND	0.069	ND	0.0061	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

L = Laboratory control sample recovery outside the specified limits, results may be biased low.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: PZAA-FB1-041013

Client Project ID: Pfizer, Bridgewater NJ

CAS Project ID: P1301548

CAS Sample ID: P1301548-010

Test Code: EPA TO-13A Modified

Date Collected: 4/10/13

Instrument ID: HP 5890II+/HP5972A/MS15

Date Received: 4/12/13

Analyst: Madeleine Dangazyan

Date Extracted: 4/17/13

Sampling Media: PUF/XAD-2 (Low Volume) Cartridge

Date Analyzed: 4/19/13

Test Notes:

Final Volume: 1.0 ml

Volume Sampled: NA Liter(s)

CAS #	Compound	Result µg/Cartridge	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
91-20-3	Naphthalene	< 5.0	NA	NA	NA	NA	
208-96-8	Acenaphthylene	< 0.50	NA	NA	NA	NA	L
83-32-9	Acenaphthene	< 0.50	NA	NA	NA	NA	
86-73-7	Fluorene	< 0.50	NA	NA	NA	NA	
85-01-8	Phenanthrene	< 0.50	NA	NA	NA	NA	
120-12-7	Anthracene	< 0.50	NA	NA	NA	NA	
206-44-0	Fluoranthene	< 0.50	NA	NA	NA	NA	
129-00-0	Pyrene	< 0.50	NA	NA	NA	NA	
56-55-3	Benz(a)anthracene	< 0.50	NA	NA	NA	NA	
218-01-9	Chrysene	< 0.50	NA	NA	NA	NA	
205-99-2	Benzo(b)fluoranthene	< 0.50	NA	NA	NA	NA	
207-08-9	Benzo(k)fluoranthene	< 0.50	NA	NA	NA	NA	
50-32-8	Benzo(a)pyrene	< 0.50	NA	NA	NA	NA	
193-39-5	Indeno(1,2,3-cd)pyrene	< 0.50	NA	NA	NA	NA	
53-70-3	Dibenz(a,h)anthracene	< 0.50	NA	NA	NA	NA	
191-24-2	Benzo(g,h,i)perylene	< 0.50	NA	NA	NA	NA	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

L = Laboratory control sample recovery outside the specified limits, results may be biased low.

NA = Not applicable.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill

Client Sample ID: Method Blank

Client Project ID: Pfizer, Bridgewater NJ

CAS Project ID: P1301548

CAS Sample ID: P130417-MB

Test Code: EPA TO-13A Modified
 Instrument ID: HP 5890II+/HP5972A/MS15
 Analyst: Madeleine Dangazyan
 Sampling Media: PUF/XAD-2 (Low Volume) Cartridge
 Test Notes:

Date Collected: NA
 Date Received: NA
 Date Extracted: 4/17/13
 Date Analyzed: 4/19/13
 Final Volume: 1.0 ml
 Volume Sampled: NA Liter(s)

CAS #	Compound	Result µg/Cartridge	Result µg/m³	MRL µg/m³	Result ppbV	MRL ppbV	Data Qualifier
91-20-3	Naphthalene	< 5.0	NA	NA	NA	NA	
208-96-8	Acenaphthylene	< 0.50	NA	NA	NA	NA	L
83-32-9	Acenaphthene	< 0.50	NA	NA	NA	NA	
86-73-7	Fluorene	< 0.50	NA	NA	NA	NA	
85-01-8	Phenanthrene	< 0.50	NA	NA	NA	NA	
120-12-7	Anthracene	< 0.50	NA	NA	NA	NA	
206-44-0	Fluoranthene	< 0.50	NA	NA	NA	NA	
129-00-0	Pyrene	< 0.50	NA	NA	NA	NA	
56-55-3	Benz(a)anthracene	< 0.50	NA	NA	NA	NA	
218-01-9	Chrysene	< 0.50	NA	NA	NA	NA	
205-99-2	Benzo(b)fluoranthene	< 0.50	NA	NA	NA	NA	
207-08-9	Benzo(k)fluoranthene	< 0.50	NA	NA	NA	NA	
50-32-8	Benzo(a)pyrene	< 0.50	NA	NA	NA	NA	
193-39-5	Indeno(1,2,3-cd)pyrene	< 0.50	NA	NA	NA	NA	
53-70-3	Dibenz(a,h)anthracene	< 0.50	NA	NA	NA	NA	
191-24-2	Benzo(g,h,i)perylene	< 0.50	NA	NA	NA	NA	

ND = Compound was analyzed for, but not detected above the laboratory reporting limit.

MRL = Method Reporting Limit - The minimum quantity of a target analyte that can be confidently determined by the referenced method.

L = Laboratory control sample recovery outside the specified limits, results may be biased low.

NA = Not applicable.

SURROGATE SPIKE RECOVERY RESULTS

Page 1 of 1

Client: CH2M Hill
Client Project ID: Pfizer, Bridgewater NJ

CAS Project ID: P1301548

Test Code: EPA TO-13A Modified Date(s) Collected: 4/10/13
Instrument ID: HP 5890II+/HP5972A/MS15 Date(s) Received: 4/12/13
Analyst: Madeleine Dangazyan Date(s) Extracted: 4/17/13
Sampling Media: PUF/XAD-2 (Low Volume) Cartridge(s) Date(s) Analyzed: 4/19/13
Test Notes:

Client Sample ID	CAS Sample ID	Fluorene-d10		Pyrene-d10		Data Qualifier
		% Recovered	Acceptance Limits	% Recovered	Acceptance Limits	
Method Blank	P130417-MB	69	60-120	90	60-120	
Lab Control Sample	P130417-LCS	77	60-120	91	60-120	
Duplicate Lab Control Sample	P130417-DLCS	70	60-120	90	60-120	
PZAA-C1-041013	P1301548-001	74	60-120	91	60-120	
PZAA-C2-041013	P1301548-003	73	60-120	90	60-120	
PZAA-C3-041013	P1301548-005	73	60-120	87	60-120	
PZAA-C3-041013-D	P1301548-007	75	60-120	87	60-120	
PZAA-FB1-041013	P1301548-010	82	60-120	91	60-120	

LABORATORY CONTROL SAMPLE / DUPLICATE LABORATORY CONTROL SAMPLE SUMMARY

Page 1 of 1

Client: CH2M Hill

Client Sample ID: Duplicate Lab Control Sample

Client Project ID: Pfizer, Bridgewater NJ

CAS Project ID: P1301548

CAS Sample ID: P130417-DLCS

Test Code: EPA TO-13A Modified

Date Collected: NA

Instrument ID: HP 5890II+/HP5972A/MS15

Date Received: NA

Analyst: Madeleine Dangazyan

Date Extracted: 4/17/13

Sampling Media: PUF/XAD-2 (Low Volume) Cartridge

Date Analyzed: 4/19/13

Test Notes:

Volume(s) Analyzed: NA Liter(s)

CAS #	Compound	Spike Amount		Result		CAS		RPD	RPD	Data Limit	Data Qualifier
		LCS / DLCS µg/ml	LCS µg/ml	DLCS µg/ml	% Recovery LCS	% Recovery DLCS	Acceptance Limits				
91-20-3	Naphthalene	10.0	7.04	6.86	70	69	60-120	1	18		
208-96-8	Acenaphthylene	10.0	6.09	5.91	61	59	60-120	3	18		L
83-32-9	Acenaphthene	10.0	7.01	6.47	70	65	60-120	7	19		
86-73-7	Fluorene	10.0	7.66	7.30	77	73	60-120	5	20		
85-01-8	Phenanthrene	10.0	8.45	7.65	85	77	60-120	10	20		
120-12-7	Anthracene	10.0	7.93	7.88	79	79	60-120	0	19		
206-44-0	Fluoranthene	10.0	8.59	8.83	86	88	60-120	2	21		
129-00-0	Pyrene	10.0	8.72	8.83	87	88	60-120	1	21		
56-55-3	Benz(a)anthracene	10.0	8.55	8.28	86	83	60-120	4	17		
218-01-9	Chrysene	10.0	8.33	8.30	83	83	60-120	0	17		
205-99-2	Benzo(b)fluoranthene	10.0	9.07	9.04	91	90	60-120	1	18		
207-08-9	Benzo(k)fluoranthene	10.0	9.35	8.76	94	88	60-120	7	19		
50-32-8	Benzo(a)pyrene	10.0	8.45	8.79	85	88	60-120	3	19		
193-39-5	Indeno(1,2,3-cd)pyrene	10.0	9.11	8.99	91	90	60-120	1	19		
53-70-3	Dibenz(a,h)anthracene	10.0	8.67	8.55	87	86	60-120	1	20		
191-24-2	Benzo(g,h,i)perylene	10.0	8.79	8.71	88	87	60-120	1	22		

L = Laboratory control sample recovery outside the specified limits, results may be biased low.

RESULTS OF ANALYSIS

Page 1 of 1

Client: CH2M Hill
Client Project ID: Pfizer, Bridgewater NJ

CAS Project ID: P1301548

Method Blank Summary

Test Code: EPA TO-13A Modified
Instrument ID: HP 5890II+/HP5972A/MS15 Lab File ID: 04191306.D
Analyst: Madeleine Dangazyan Date Analyzed: 4/19/13
Sampling Media: PUF/XAD-2 (Low Volume) Cartridge(s) Time Analyzed: 13:44
Test Notes:

Client Sample ID	CAS Sample ID	Lab File ID	Time Analyzed
Lab Control Sample	P130417-LCS	04191304.D	12:47
Duplicate Lab Control Sample	P130417-DLCS	04191305.D	13:15
PZAA-C1-041013	P1301548-001	04191307.D	14:12
PZAA-C2-041013	P1301548-003	04191308.D	14:40
PZAA-C3-041013	P1301548-005	04191309.D	15:08
PZAA-C3-041013-D	P1301548-007	04191310.D	15:37
PZAA-FB1-041013	P1301548-010	04191311.D	16:05

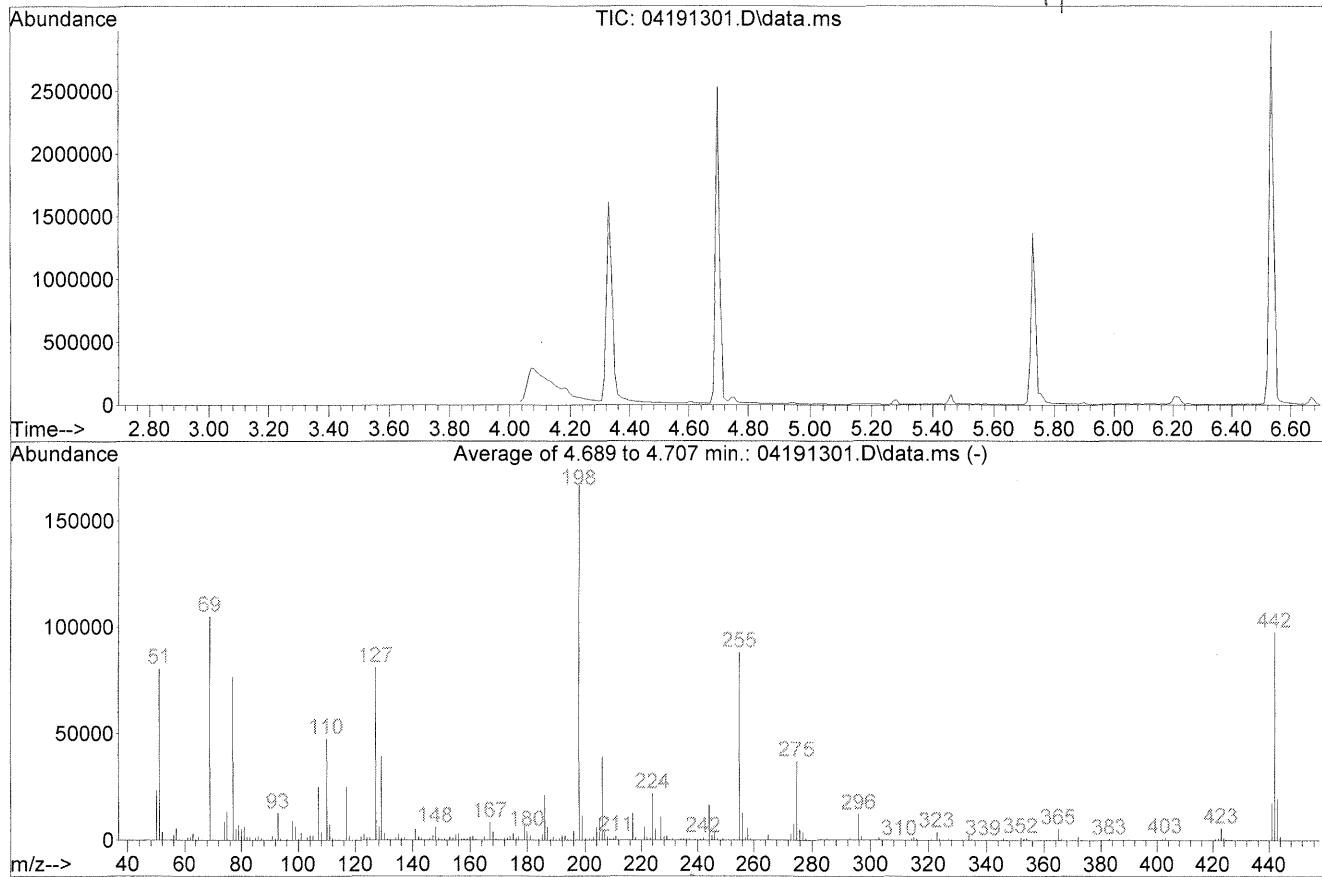
DFTPP

Data Path : J:\MS15\DATA\TO13\2013_04\19\
 Data File : 04191301.D
 Acq On : 19 Apr 2013 11:00 am
 Operator : MD
 Sample : 50ug/ml DFTPP tune check
 Misc : S26-12031203
 ALS Vial : 1 Sample Multiplier: 1

Integration File: events.e

Method : J:\MS15\METHODS\PAH_PCP021213E.M
 Title : TO-13A Modified For PAHs in SIM
 Last Update : Tue Mar 12 12:47:19 2013

MD
4/22/13



AutoFind: Scans 74, 75, 76; Background Corrected with Scan 69

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
51	198	30	60	48.1	80525	PASS
68	69	0.00	2	0.0	0	PASS
69	198	0.00	100	62.7	104959	PASS
70	69	0.00	2	0.4	446	PASS
127	198	40	60	48.4	81104	PASS
197	198	0.00	1	0.0	0	PASS
198	198	100	100	100.0	167424	PASS
199	198	5	9	6.8	11349	PASS
275	198	10	30	22.1	36939	PASS
365	198	1	100	3.2	5322	PASS
441	443	0.01	100	90.3	17468	PASS
442	198	40	100	58.3	97630	PASS
443	442	17	23	19.8	19352	PASS

Response Factor Report MS15

Method Path : J:\MS15\METHODS\
 Method File : PAH PCP021213E.M
 Title : TO-13A Modified For PAHs in SIM
 Last Update : Tue Mar 12 12:47:19 2013
 Response Via : Initial Calibration

Calibration Files

0.5 =02121306.D 1 =02121307.D 5 =02121308.D 10 =02121309.D
 20 =02121310.D 40 =02121311.D

	Compound	0.5	1	5	10	20	40	Avg	%RSD
<hr/>									
1) I	Naphthalene-d8				-----ISTD-----				
2)	Naphthalene	1.184	1.263	1.019	1.133	1.152	0.999	1.125	8.91
3) I	Acenaphthene-d10				-----ISTD-----				
4)	Acenaphthylene	2.389	2.439	1.977	2.035	2.301	1.945	2.181	10.10
5)	Acenaphthene	1.416	1.413	1.089	1.166	1.263	0.991	1.223	14.16
6) S	Fluorene-d10	1.541	1.465	1.157	1.200	1.157	0.974	1.249	17.06
7)	Fluorene	1.666	1.748	1.307	1.330	1.451	1.258	1.460	13.91
8) I	Phenanthrene-d10				-----ISTD-----				
9)	Pentachlorophenol	0.042	0.048	0.080	0.113	0.129	0.159	0.095	48.80
10)	Phenanthrene	1.215	1.324	0.990	0.979	1.045	0.844	1.066	16.37
11)	Anthracene	1.366	1.363	1.116	1.202	1.175	1.106	1.221	9.54
12) S	Fluoranthene-d10	1.227	1.356	1.049	1.096	1.131	1.037	1.149	10.61
13)	Fluoranthene	1.363	1.454	1.144	1.181	1.212	1.105	1.243	10.95
14) S	Pyrene-d10	1.030	1.076	0.879	0.919	0.956	0.871	0.955	8.70
15)	Pyrene	1.388	1.426	1.157	1.227	1.256	1.137	1.265	9.39
16) I	Chrysene-d12				-----ISTD-----				
17)	Benzo[a]anthra...	1.534	1.502	1.193	1.317	1.322	1.162	1.338	11.46
18)	Chrysene	1.407	1.481	1.179	1.292	1.305	1.178	1.307	9.27
19) I	Perylene-d12				-----ISTD-----				
20)	Benzo[b]fluora...	1.318	1.352	1.327	1.209	1.196	1.166	1.261	6.32
21)	Benzo[k]fluora...	1.236	1.417	1.221	1.311	1.235	1.153	1.262	7.20
22) S	Benzo[a]pyrene...	0.949	0.907	0.801	0.856	0.860	0.762	0.856	7.96
23)	Benzo[a]pyrene	1.142	1.201	0.980	1.052	1.101	0.926	1.067	9.61
24)	Indeno[1,2,3-c...	1.048	1.117	0.918	1.087	1.055	1.010	1.039	6.70
25)	Dibenz[a,h]ant...	1.021	1.092	0.898	1.031	1.023	0.926	0.999	7.28
26)	Benzo[g,h,i]pe...	1.135	1.176	1.023	1.072	1.063	0.931	1.067	8.05

(#) = Out of Range

ALS Environmental**TO13A Daily CCV QC Check**

Date Acquired : 4/19/2013

Instrument : MS15

Analyst : MD

Printed : 4/22/2013

CCV Level : 20 ug/ml**CCV RRF QC Check**

(Less than 30% Difference from ICAL and Greater Than Minimum RRF)

CCV RRF QC	ICAL Mean RRF	20ug/ml PAHs+PCP CCV	% RRF Difference	Minimum RRF	QC Check
Naphthalene-d8					
Naphthalene	1.125	1.129	0.3%	0.700	Pass
Acenaphthene-d10					
Acenaphthylene	2.181	2.036	6.7%	1.300	Pass
Acenaphthene	1.223	1.099	10.1%	0.800	Pass
Fluorene-d10				SS	
Fluorene	1.460	1.406	3.7%	0.900	Pass
Phenanthrene-d10					
Phenanthrene	1.066	1.006	5.7%	0.700	Pass
Anthracene	1.221	1.354	10.9%	0.700	Pass
Fluoranthene-d10				FS	
Fluoranthene	1.243	1.307	5.1%	0.600	Pass
Pyrene-d10				SS	
Pyrene	1.265	1.360	7.5%	0.600	Pass
Chrysene-d12					
Benzo(a)anthracene	1.338	1.278	4.5%	0.800	Pass
Chrysene	1.307	1.262	3.5%	0.700	Pass
Perylene-d12					
Benzo[b]fluoranthene	1.261	1.233	2.3%	0.700	Pass
Benzo[k]fluoranthene	1.262	1.194	5.4%	0.700	Pass
Benzo[a]pyrene-d12				FS	
Benzo[a]pyrene	1.067	1.159	8.6%	0.700	Pass
Indeno[1,2,3-cd]pyrene	1.039	0.967	6.9%	0.500	Pass
Dibenz[a,h]anthracene	0.999	1.007	0.8%	0.400	Pass
Benzo[g,h,i]perylene	1.067	1.063	0.4%	0.500	Pass

FS = Field Spike

SS = Surrogate Spike

ALS Environmental**TO-13A Daily IS RT And Response QC Check**ACquired Date : 4/19/2013
Instrument : MS15Analyst : MD
Printed : 4/22/2013**IS Response Check** (IS Response Differences Between -50% and +100% From Daily CCV)

Response	Naphthalene-d8	Acenaphthene-d10	Phenanthrene-d10	Chrysene-d12	Perylene-d12			
20ug/ml PAHs+PCP CCV	9241065	QC Check	5116099	QC Check	7417473	QC Check	7236944	QC Check
LCS 10ug/ml ext.4/17/13 fv=1mL	8749085	Pass	4574296	Pass	8089120	Pass	7129320	Pass
LCSD 10ug/ml ext.4/17/13 fv=1mL	8787144	Pass	4644377	Pass	7792091	Pass	7326233	Pass
MB ext.4/17/13 fv=1mL	9251336	Pass	4893997	Pass	8176449	Pass	7495407	Pass
P1301548-001 ext.4/17/13 fv=1mL	8784542	Pass	4709021	Pass	8099435	Pass	7400305	Pass
P1301548-003 ext.4/17/13 fv=1mL	8934809	Pass	4805873	Pass	8417196	Pass	7326627	Pass
P1301548-005 ext.4/17/13 fv=1mL	8882008	Pass	4696288	Pass	8413876	Pass	6866238	Pass
P1301548-007 ext.4/17/13 fv=1mL	8801710	Pass	4651113	Pass	8500973	Pass	7221268	Pass
P1301548-010 ext.4/17/13 fv=1mL	9153417	Pass	4620680	Pass	8459623	Pass	7433725	Pass

ALS Environmental**TO-13A Daily IS RT And Response QC Check**ACquired Date : 4/19/2013
Instrument : MS15Analyst : MD
Printed : 4/22/2013**IS RT Check** (IS RT Differences Between +/- 20 Seconds)

RT	Naphthalene-d8	Acenaphthene-d10	Phenanthrene-d10	Chrysene-d12	Perylene-d12					
20ug/ml PAHs+PCP CCV	4.940	QC Check	7.100	QC Check	9.590	QC Check	15.250	QC Check	18.290	QC Check
LCS 10ug/ml ext.4/17/13 fv=1mL	4.930	Pass	7.080	Pass	9.580	Pass	15.230	Pass	18.270	Pass
LCSD 10ug/ml ext.4/17/13 fv=1mL	4.930	Pass	7.080	Pass	9.580	Pass	15.230	Pass	18.270	Pass
MB ext.4/17/13 fv=1mL	4.930	Pass	7.080	Pass	9.580	Pass	15.230	Pass	18.270	Pass
P1301548-001 ext.4/17/13 fv=1mL	4.930	Pass	7.080	Pass	9.580	Pass	15.230	Pass	18.270	Pass
P1301548-003 ext.4/17/13 fv=1mL	4.930	Pass	7.080	Pass	9.580	Pass	15.230	Pass	18.270	Pass
P1301548-005 ext.4/17/13 fv=1mL	4.930	Pass	7.080	Pass	9.580	Pass	15.230	Pass	18.270	Pass
P1301548-007 ext.4/17/13 fv=1mL	4.930	Pass	7.080	Pass	9.580	Pass	15.230	Pass	18.270	Pass
P1301548-010 ext.4/17/13 fv=1mL	4.930	Pass	7.080	Pass	9.580	Pass	15.230	Pass	18.270	Pass